

By the Same Author

GROUNDWORK OF EDUCATIONAL
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GROUNDWORK³ OF EDUCATIONAL THEORY

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PREFACE

THIS book is a study of educational problems complementary to that provided in my earlier *Groundwork of Educational Psychology*, to which it should be regarded as a companion volume. While it would be gross exaggeration to say that the psychological movement in education has spent itself, it is yet true that the swift movement of civilization towards the catastrophe of a second great war has brought about, both in educational circles and among the general public, a clearer realization of the cardinal fact that the science of education must be subordinate to its philosophy, and that knowledge of child nature and technique in teaching, however exact, are merely tools to employ in the effort to attain a worth-while aim in education. No apology, therefore, should be needed for a consideration of the philosophy that must guide our practice if the education and the re-education of the period of reconstruction are to play the part that is desired and expected of them.

Keeping in mind chiefly the needs of students who are preparing for the teaching profession, I have aimed at providing a first discussion of the principles and practice of education from a broad philosophical standpoint. In the interests of clear exposition I have largely ignored the subtleties of thought that are rightly characteristic of a systematic study of philosophy. I can hardly cherish the hope that the result will commend itself to any academic philosopher who may perchance scan these pages and who may, with some justice, accuse me of over-simplifying philosophical doctrines,

of making too clean-cut the distinctions between them, of selecting what suited my purpose and neglecting the rest. My excuse must be that my experience has convinced me that students need a simple exposition on broad lines before they can tackle with zest the more exact and more difficult books that are available. If my volume can do anything to convince the intending teacher that he needs a clearly formulated philosophy of life and of education, if it stimulates him to begin and continue his search for it, then it will have fulfilled its purpose, and I shall feel justified in craving the indulgence of any reader who is well versed in philosophy.

Since my purpose is above all expository, I have not hesitated to draw freely on the works of others. Chief among these are my own teachers: the late Sir John Adams, Sir T. Percy Nunn, and Dr Robert R. Rusk. Where I have been conscious of my indebtedness I have made acknowledgment in the text: but I realize that, since I have absorbed so much of their teaching through both the spoken and the written word, I must frequently have borrowed their ideas unconsciously. It is to them most of all that I desire to record my deep indebtedness and my warm gratitude.

My grateful thanks are due also to my sister, Miss Helen S. Ross, and my colleague, Dr T. B. Shepherd, not only for their careful reading of my manuscript, but also for many acute observations and criticisms; and to the Rev. Dr A. W. Harrison and Mrs G. Elsie Harrison for reading and commenting on the last chapter. I must also thank Mr F. H. Pritchard, of Messrs George G. Harrap and Company, Ltd., for encouraging me to write the book and for undertaking to publish it in spite of war-time difficulties.

Finally, I have to thank the following publishers for

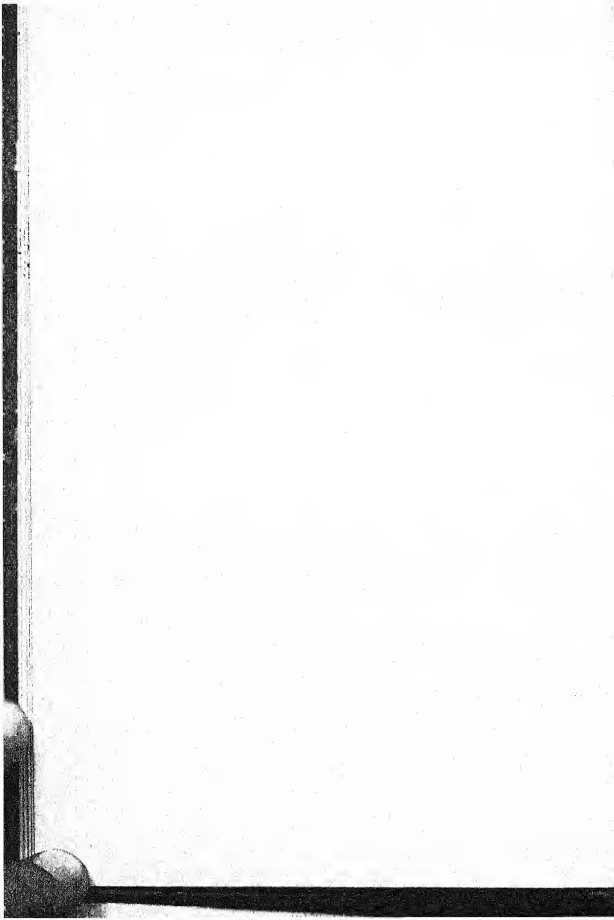
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While I dedicate my work in general to the men of Westminster College, I have very specially in mind those who at present are gallantly serving their country in His Majesty's Forces. It is my fervent hope that, when they return to play a not less noble part in the work of reconstruction, they may find here some small measure of guidance and inspiration.

J. S. R.

WESTMINSTER COLLEGE

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CHAPTER I

PHILOSOPHY AND EDUCATION

CHESTERTON, in one of his essays, has observed that while it is important for a landlady to know the income of a prospective lodger it is even more important for her to know his philosophy of life. If the reader can believe that this may be true of the prosaic business of letting rooms, he will be the less alarmed at the assertion that all educational questions are ultimately questions of philosophy; he will not think that such an assertion is an attempt to translate what is practical and immediate into the realms of the abstruse and remote, or an invitation to an absent-minded dreamer who may adorn a university chair to cast his shadow across the path of the practical teacher in the schools. But if he remains sceptical, perhaps a little inquiry into the meanings of the words 'philosophy' and 'education' will convince him that the two notions, like the sides of a coin, present different views of the same thing, and that the one is implied by the other.

What, then, is philosophy? In university circles one talks of natural philosophy, mental philosophy, and moral philosophy, meaning by these terms the study of nature, mind, and morals respectively. But in the university calendar we have the subject 'Philosophy,' without any limiting adjective. We find the meaning of the term clearly indicated if we turn to Plato's *Republic*. "He who has a taste for every sort of knowledge and who is curious to learn and is never satisfied

may be justly termed a philosopher.”¹ He is one who loves to know; with an insatiable thirst for knowledge he eagerly applies himself to learn what the various sciences can teach him, delving into one plot after another of human knowledge. But he does this with a definite object in view. No mere picker-up of crumbs of wisdom, he seeks to construct an edifice with the bricks supplied him by the various sciences, relating and synthesizing their separate conclusions into a comprehensive whole. He is “a lover, not of a part of wisdom only, but of the whole.”¹ Nothing is beyond his scope; he takes all knowledge to be his province, setting no bounds to his vision. His desire is “to see life steadily and see it whole.” To Glaucon who asked: “Who are the true philosophers?” Socrates replied: “Those who are lovers of the vision of truth.”¹ The knowledge they love is of the sort “which shows them the eternal nature not varying from generation and corruption.”²

Thus it is reality itself, and nothing less, that is the subject of philosophical inquiry. While this is so, a major question of philosophy always has been, and always will be, the ancient query of the psalmist: “What is man?” The consideration of the heavens, the moon, and the stars is always subsidiary to the all-absorbing questions of the nature of life, the nature of man, his origin and destiny, the goal of his strivings. The philosopher pursues knowledge in order to find answers to such questions; different philosophies are merely so many different answers to them. Indeed it may be said that all who attempt sincerely and courageously to provide answers having some degree of consistency and rationality have a claim to philosophical

¹ *Republic*, V, 475.

² *Ibid.*, VI, 485.

rank, whether they are materialists, biologists, theologians, or agnostics. The early thinkers who deified natural phenomena; the nineteenth-century scientists who sought their explanation in terms of atoms, motion, and energy; religious people of any age who have seen the direct intervention of God in human affairs; all have been philosophers in so far as they have sought to provide a reasoned-out point of view on these fundamental matters. Perhaps it would not be going too far to say that it is just the asking of such questions, along with the attempt to answer them, that constitutes the philosophical attitude towards life, whether the theories propounded are probable or improbable, exalted or low, consistent or inconsistent.

Now it matters intensely what a man believes about life. Professor John Dewey, pleading for a practical philosophy, has said: "Whenever philosophy has been taken seriously, it has always been assumed that it signified achieving a wisdom that would influence the conduct of life."¹ More recently Aldous Huxley has asserted:

Men live in accordance with their philosophy of life, their conception of the world. This is true even of the most thoughtless. It is impossible to live without a metaphysic. The choice that is given us is not between some kind of metaphysic and no metaphysic; it is always between a good metaphysic and a bad metaphysic, a metaphysic that corresponds reasonably closely with observed and inferred reality and one that doesn't.²

We are accustomed in ordinary speech to say that a man takes things 'philosophically' if in adverse

¹ *Democracy and Education*, p. 378.

² *Ends and Means*, p. 252.

circumstances he remains calm and imperturbable, meaning that his general viewpoint is such that he can see the disturbances of ordinary life in proper perspective, that he has a philosophy of life that is of some use to him. When a person has a certain belief about life, he will, if his belief is vital and not merely an academic thesis, become a living exemplar of it. A genuine philosophy matters to its possessor to the extent of making him at least try to live in accordance with it.

Different philosophies, then, will result in different ways of life. An Omar Khayyám who believes that "the flower that once has blown for ever dies" finds it quite natural and right to "take the Cash in hand and waive the Rest," to "fill the Cup" and enjoy himself. We hardly expect him, with such a philosophy of pessimism, to live a life of hard endeavour like St Paul who, looking for a crown of righteousness which the Lord the righteous judge will give him, fights a good fight, beating his body black and blue in order to qualify for it. We do not expect him to identify himself with monasticism like St Augustine, who could say: "Thou awakest us to delight in Thy praise, for Thou madest us for Thyself and our heart is unquiet till it rest in Thee." Aldous Huxley, in the intensely interesting book already quoted,¹ describes his own transition from the standpoint of old Omar Khayyám, with its corollary of a life of pleasure-seeking, to a higher, more idealistic philosophical plane from which he can proclaim that the ideal goal of human effort is the increase of human charity, and accept all the consequences of such a position. Again, a man supremely concerned with the importance of his own personal holiness may be impelled to withdraw from a world

¹ *Ends and Means*.

of evil men, whereas exactly the opposite will be true of one who holds a philosophy of social service. In short, a philosophy results in a certain way of life. And the converse of this proposition is true also. Do we not infer a man's philosophy from his way of living? Do we not say that actions speak louder than words, or quote: "By their fruits ye shall know them"? So true is it that manner of life follows from belief that we make a man's conduct the test of the sincerity of his profession.

But a person with a vital belief about the things that matter does not as a rule rest content with shaping his own life. Burning with missionary zeal, wanting others to think as he does, he seeks to proselytize, to make converts. Examples of this tendency are not far to seek. The Scottish Covenanters had to bear their testimony in season and out of season, although they might often have avoided trouble by keeping a quiet tongue in their heads. In Hyde Park on a Sunday we may hear all the creeds under the sun preached by sincere and earnest advocates. Communists and Fascists alike must endeavour to spread their political faiths abroad; and a vital part of the life and work of a Christian church is its missionary effort. Not only then do we judge of the vitality of a belief by the manner of life of those who profess it; we also take into consideration the zeal they show in bringing others to their point of view. It has been well said that the church which ceases to be a missionary church is dead. Equally true is it that the church that has no interest in education is dead, for of course the most fruitful field for an effective missionary effort is among the young. The Jesuits have always known this, and the Roman Catholic church to-day is as eager as ever to keep its footing in the schools. A

belief then, if it is vital, is bound to result in an educative effort. Sir John Adams used to tell his students that education is the dynamic side of philosophy. It is the active aspect of philosophical belief, the practical means of realizing ideals of life. We began by saying that philosophy and education are like the two sides of a coin; here we reach the conclusion that the former is the contemplative side, while the latter is the active side. Broadly speaking, then, we may think of education as the influence of a person who holds a vital belief brought to bear on another person, with the object of making him also hold that belief. It will be helpful at this point to examine the notion of education a little further; in doing this we may profitably follow the masterly analysis put forward by Adams.¹

Those of us in the teaching profession who are middle-aged or elderly remember having been told in our student days that education was the art of 'leading out,' and that this was proved by the derivation of the word. *E* means 'out of,' and *duco* means 'I lead.' From this initial proposition we were asked to believe that the whole of education—intellectual, moral, and physical—consisted in leading out the innate knowledge, virtues, and powers of the child, making the potential actual. No doubt there is a modicum of truth in this view, for nothing is made from nothing. But it is clear that as applied to much of intellectual education it is nonsense. The most skilful teacher in the world cannot educe the date of the battle of Hastings or the conjugation of *amo* from a pupil who does not already know them; he has simply to put these things, and many others, into the pupil's mind. And it may seriously be doubted whether moral sentiments appear merely as the

¹ *Evolution of Educational Theory*, Chapter I.

result of a leading-out process: in moral education it is probably safer to assume that qualities such as justice and truthfulness need to be handed on from the elder to the younger generation. In any case, as Adams has pointed out, the derivation of the word proves nothing. Appeals to the Latin dictionary leave the question exactly where it was. There, certainly, we find the word *educere* meaning 'to lead out,' but we also find the word *educare* meaning 'to educate,' 'to bring up,' 'to raise,' as they say in America, or *élever*, as they say in France. And it is from the latter that our word 'education' is directly derived. While then we give our unstinted admiration to the teacher who by skilful questioning and cross-questioning can make a pupil think for himself, relate one fact to another, and form his own conclusions, we must remember that this is by no means the whole of the complex process we call education. Our approach to it as the dynamic side of philosophy gives us a more helpful, general notion than any real or fancied derivation of the word, or any identification of the whole idea with an undoubtedly important part of the teacher's art.

We have seen that the person who is being educated has influence brought to bear on him. Education thus consists in a modification of natural development which, as a result of education, is other than it would have been without it. So, if our approach is the correct one, education in the last resort cannot take place without influence. There must be some qualification of the modern doctrine that the best education consists in withholding all influence from the child, allowing him to develop entirely as his nature prompts. Even an A. S. Neill, pleading with all his wit and eloquence for the freedom of the young from adult interference, does

not withdraw himself from his school, and presumably his presence has some effect on the development of those under his charge. Education then, we reiterate, implies a modification of natural development.

What are the agents that produce this modification? To find an answer to this question Adams quotes from the famous inaugural address at St Andrews of John Stuart Mill:

Not only does it [education] include whatever we do for ourselves, and whatever is done for us by others, for the express purpose of bringing us somewhat nearer to the perfection of our nature ; it does more: in its largest acceptation, it comprehends even the indirect effects produced on character and on the human faculties, by things of which the direct purposes are quite different ; by laws, by forms of government, by the industrial arts, by modes of social life ; nay even by physical facts not dependent on human will ; by climate, soil, and local position. Whatever helps to shape the human being ; to make the individual what he is, or hinder him from being what he is not—is part of his education.¹

The influence of such factors as Mill enumerates is undeniable, and the modification of natural development that they produce is profound, but ought we to include them in our notion of education? Clearly we can hardly do so and still maintain that education is the dynamic side of philosophy. Mill himself narrows down the notion of education to "the culture which each generation purposely gives to those who are to be its successors, in order to qualify them for at least keeping up, and if possible for raising, the level of improvement which has been maintained."² Here his notion of

¹ James and John Stuart Mill on *Education*, pp. 132, 133.

² James and John Stuart Mill on *Education*, p. 133.

education as a purposive process is in line with the position we have taken up. We may think of education, not as any influence, but as purposive influence, and, since purpose implies a person, we see that there must be a personal educator.

There must, then, be two persons in education, one of whom, the educator, is deliberately seeking to modify the development of the other. Like a magnet, education must have two poles; it is a bi-polar process. At the one pole we have the educator. What shall we call the person at the other end? The word 'pupil' of course suggests itself, but it is a 'teacher' who acts on a pupil. Since it is generally agreed that 'educator' is a wider term than 'teacher,' there is need for a term wider than 'pupil.' Adams has suggested the word 'educand' to fill the blank, meaning 'the person to be educated,' and it might be well in the interests of clear thinking to follow his lead.

Now the educator is the person in whose mind the purpose of the process resides. He it is who conceives the deliberate intention of bringing influence to bear on the educand and sets about doing it. It is worth noting here that when the educand himself adopts the purpose of modifying his own nature he becomes in a very real sense his own educator. Self-education ought to mean that a person is making use of teachers, schools, and books as a means to an end realized more or less clearly by himself. Self-education in this sense marks a very satisfactory stage in an educative process; when the drive comes from the educand himself the earlier personal educator may feel with justification that he has succeeded, and rest assured that the process of education will continue independently of his efforts.

If, as we have said, education is a wider term than

teaching, in what respect is it wider? *Teaching* is usually applied to the imparting of knowledge and skills, and since these constitute an important modification of natural development it is clear that teaching must be a means of education. But teaching does not include the personal influence of the educator; it is this that is the other main aspect of education, and it is of enormous importance. So the means of education are twofold: firstly, teaching, or the imparting of knowledge and skills; and secondly, the personal influence of the educator. As education proceeds to the stage where it can properly be called self-education, as character consolidates and will and purpose develop, the latter becomes less important than the former.

Adams sums up his analysis of education in the following propositions:¹

(1) It is a bi-polar process in which one personality acts upon another in order to modify the development of that other.

(2) The process is not only a conscious but a deliberate one. The educator has the clearly realized intention of modifying the development of the educand.

(3) The means by which the development of the educand is to be modified are twofold: (a) the direct application of the educator's personality to the personality of the educand, and (b) the use of knowledge in its various forms.

In what direction is the modification of the nature of the educand to take place? What are the standards and values that should guide the educator in exerting his influence? What education is of the most worth? It is unfortunately true to say that there is no universally

¹ *Evolution of Educational Theory*, p. 39.

agreed answer to these fundamental questions. To-day, as in the days of Aristotle,

There is no agreement as to what the young should learn, either with a view to the production of goodness or the best life, nor is it settled whether we ought to keep the intellect or the character chiefly in view. If we start from the education we see round us, the inquiry is perplexing, and there is no certainty as to whether education should be a training in what is useful for life, or in what tends to promote goodness, or in more out-of-the-way subjects. Each of these views finds some supporters; but there is not even any agreement as to what tends to promote goodness. To begin with, all people do not appreciate the same kind of goodness, so it is only to be expected that they should differ about the required training.¹

The reason for the lack of agreement is clear. "Educational aims are correlative to ideals of life,"² and so long as these ideals diverge so long will educational aims fail to agree. Herbert Spencer, the nineteenth-century agnostic, asserted that the aim of education is complete living; but Loyola, the founder of the Society of Jesus, directed all his efforts "to the greater glory of God," and the writer of *Paradise Lost* saw that the end of learning is "to repair the ruines of our first Parents by regaining to know God aright, and out of that knowledge to love him, to imitate him, to be like him, as we may the neerest by possessing our souls of true vertue, which being united to the heavenly grace of faith makes up the highest perfection."³ Loyola and Milton kept a constant eye on Heaven, whereas Spencer sought to

¹ Aristotle: *Politics*, VIII, 2.

² Nunn: *Education: its Data and First Principles*, p. 2.

³ Milton: *Tractate on Education*.

make the best of earth, and it is idle to try to reconcile their views on education.

It is the purpose of this book to expand the dictum that education is the dynamic side of philosophy, to outline some philosophical doctrines and to examine the educational aims and methods that are their corollaries. It is only by doing this that one may reasonably hope to escape from confusion and eventually to stand on the solid rock of a stable educational faith.

If further argument is needed to establish the fundamental dependence of education on philosophy, it may be found in the fact that, on the whole, the great philosophers have been the great educationists. The merest glance at a book on the history of education shows that educational movements are the workings-out of various philosophical positions; and the outstanding names found in such a book are largely identical with those found in a history of philosophy. We have already seen the reason for this; a philosopher, if he is really in earnest, naturally becomes an educationist. Let us consider a few actual examples.

Socrates left us no written word, and we have to see him through the eyes of his admirers and disciples, such as Plato, or of his detractors, such as Aristophanes. Since we can never be sure how far these others are reporting his words and how far they are employing him as a dramatic figure, it is difficult to be quite certain of what he actually thought and taught. But we gather that he questioned the validity of traditional standards, and that because of this he was accused of being a Sophist—one of those philosophers of expediency who taught their pupils how to get on in the public life of a city state, and trained them in the oratorical

and argumentative arts that could "make the worse appear the better reason." Socrates, however, reacted strongly from any notion that the good is the expedient; he saw the need for an abiding standard against which moral judgments might be measured, and he believed that ideas of universal validity existed in the very nature of things. These universal ideas could be found by a fearless pursuit of truth; they were latent in the mind of every man, but they needed to be brought into clear consciousness. Actuated by such a belief, he seems to have made it his main task in life to bring such ideas to light in the minds of those with whom he associated. Believing in his philosophy, he became an active educationist; we hail him as one of the greatest teachers of all time, and we still apply in our schools, wittingly or unwittingly, his method of teaching by questioning and cross-questioning.

His disciple Plato was perhaps the greatest philosopher who ever lived. The importance of his contribution to philosophy cannot be measured, and his influence on western thought has been profound. We shall examine his main doctrine later; meantime we note the fact that his *Republic* is claimed by educationists as one of the greatest of their classics. Yet if one reads the opening pages of the *Republic* one finds an account of Socrates and his friends pursuing an inquiry into the nature of justice, surely a most abstract philosophical topic. Socrates, having shown the inadequacy of glib definitions to make the idea of justice clear, sets out to construct in imagination a state which shall be ideally just, one in which justice will be found 'writ large.' But to make a just state one must first produce just citizens, and so inevitably Plato's inquiry into the nature of justice becomes a treatise on education. Most of the

Republic does as a matter of fact deal directly with education.

The example of the *Republic* brings out a further important point. If education is philosophy in action, so also are politics. Political systems are in the last resort the outcome of philosophical positions. The philosophy that lies behind the traditional liberalism of this country is very different from that which informs the Fascist, Nazi, or Bolshevik regimes. A nation's politics are its philosophy in concrete form. And a political system in order to maintain itself must evolve a suitable educational policy and practice; the rigid education of the Nazi youth, for example, is in sharp contrast to the wide degree of freedom allowed in Britain. It is worthy of note that in our country every extension of the franchise has brought with it an enlargement of educational opportunity, for, if democracy is to work, citizens must be educated. Every philosophy, then, has both a political and an educational system following closely in its wake.

We find a further example of the intimate interconnexion of philosophy, politics, and education in the writings of Aristotle. Aristotle was regarded as *the* philosopher by medieval thinkers. His work was the basis of all studies in the Middle Ages and his authority was supreme up to the time of the Renaissance. His positive attitude of inquiry makes him the father of modern science. What was his philosophy of life? Virtue lay in the attainment of happiness or goodness; it was not a passive state of contemplation but an attitude of the will, and it included well-doing in addition to well-being. We have his studies of well-being and well-doing in his *Ethics* and his *Politics* respectively. But if one reads the *Politics*, parts of which unfortunately

are lost, one finds that it largely consists of views on education; these, we may say in passing, are much more refreshing and profitable to read than many modern books on the subject.

We find the clearest example of the dependence of education on philosophy in the life and teaching of Jesus. There is no evidence to suggest that the Founder of Christianity concerned Himself with politics; but with the education of His disciples He was supremely concerned. He lived His earthly life in accordance with the fundamental idea of the fatherhood of God; and in the Sermon on the Mount we have a summary of His teaching that God is indeed the Father of all men, and that therefore we are all brothers one of another. Not only was He Himself a living exemplar of such a relationship between God and man, and between man and man; by precept and parable He also taught it.

The reader will doubtless think of other examples, the working out of which will constitute a profitable exercise. He might consider John Locke, the seventeenth-century English philosopher, whose influence on our modes of thinking, as Adams says,

far exceeds his fame. Most of his followers do not know their master. His point of view coincides so completely with that of the ordinary intelligent man in the street, that his following in all English-speaking countries is greater than any other philosophical writer can command. It has been said that every child is born into this world either a little Platonist or a little Aristotelian. This may be true of the rest of the world, but wherever the verb *cogitare* is translated by the words *to think*, there every child is born a little Lockian.¹

¹ *Herbartian Psychology*, p. 33.

Informed by a passion for truth, Locke believed that a mind was capable of finding truth only when trained specifically to think: he thus conceived of education as discipline of the intellect. His views are to be found in the *Essay on the Human Understanding* and the *Thoughts Concerning Education*.

The reader might also consider Jean Jacques Rousseau, who in his *Social Contract* taught that government was the result of a contract among the people, the power to rule being delegated to some, the others supporting the rulers in return for services rendered. Society is therefore something superimposed upon the individual; it is a useful institution only so long as it functions properly, and it may easily get out of gear. Believing that in his own day society had become an end in itself rather than a means to the welfare of the individual, Rousseau worked out, in *Emile, or Education*, the conditions for an ideal education, the fortunate youth Emile being educated 'according to nature,' away from society.

There is no need to multiply examples further. The inevitable tendency for the philosopher to turn educationist is as manifest to-day as at any former time. We may think of George Bernard Shaw, H. G. Wells, Bertrand Russell, A. N. Whitehead, Aldous Huxley, and many other hard thinkers of the present day who first preach a way of life, then give us their thoughts concerning education. Later we shall consider the interesting position of the American philosopher and educationist, Professor John Dewey. No doubt he would take exception to our contention that education follows from philosophy; his view is rather that philosophy, if it is practicable and workable, is the theory of education, and presumably of politics, and that the truth is what works in practice.

Can we discern any clear connexion between present or recent modes of thought and the education we see around us? For, if our fundamental contention is correct, we ought to see in our present-day educational theory and practice the reflex of certain dominant modes of thought. Further, if it is true in the main that the philosophical outlook precedes the educational effort, we ought to expect the latter to lag behind the former.

Now it is a truism to say that a mode of thought in one realm of mental activity has a tendency to spread outward beyond its own proper boundaries. The nineteenth century was an age of machines, and it is not surprising to find persistent attempts to apply the concept of mechanism all round. Scientists made heroic attempts to describe the universe as a great machine; it is said of Lord Kelvin, for example, that he could not accept the undulatory theory of light because he was unable to make a model to illustrate it. But mechanicalism invaded many spheres other than physics, notably economics and psychology, and as a result there has been in these studies a strong tendency to ignore, or to explain away, essentially human factors. It would seem that psychology is peculiarly liable to the invasion of explanatory concepts from other fields; perhaps this is because we are reluctant to base it on a notion so difficult as mind. The psychological doctrine known as associationism is a sort of mental chemistry, and modern behaviourism is the latest attempt to apply mechanical concepts to the explanation of human behaviour and its motives. It is possible, however, that the behaviourists, in their praiseworthy attempt to bring psychology into the ranks of the exact sciences, have been building on sand so far as the notion of mechanism is concerned,

for many scientists to-day are inclined to abandon it as an ultimate explanatory principle even of the physical universe. Sir James Jeans, for example, considers that it has "already shot its bolt and has failed dismally on both the scientific and philosophical side."¹

Nineteenth-century biology gave us the notion of evolution to apply generally, the notion that higher forms of life have evolved from lower by a process of gradual and orderly change, with no discontinuities. The principle of evolution has been more fruitfully applied all round, perhaps, than any other principle first formulated in a special science; now we see architecture, laws, history, religion itself, as processes and products of evolution. One explanation of the fact of biological evolution, neo-Darwinism, with its stress on environmental factors outside the living creature, is again an attempt to apply the notion of mechanism to the world of living things. Struggle for existence and consequent survival of the fittest have even been exalted to a general philosophy of life and held to justify all sorts of throat-cutting competition and rivalry. Indeed, such an unjustifiable spread of a category of thought beyond its proper sphere must bear its share of blame for the great disaster of 1914 and the further disasters that are around us now. There is, however, an alternative line of explanation of the fact of evolution, one which emphasizes the living organism itself, its will-to-live, its *élan vital*, its drive to make the most of its circumstances, resulting in a gradual process of adaptation and change; and the spread of this gives rise to a more optimistic philosophy. Shaw, for example, seizes on it and in *Back to Methuselah* emphasizes the power of the world of living things eventually to achieve

¹ *The Mysterious Universe*, p. 146.

progress in spite of many set-backs. In education it helps us to see the child as a developing being with the power to make good, as the means through which the race itself advances.

Returning to our inquiry into the connexion between present-day modes of thought and education, we may tentatively point to two trends that seem to be dominant. The first of these is a certain distrust of mere logic; the second is a synthetic tendency apparent in twentieth-century thought. Let us consider them in turn.

Intellectualism was a marked characteristic of the nineteenth century. There was a tremendous faith in man's reason; man's intellect had achieved so much by the inductive method of modern science that it seemed reasonable to assume that, given time, all his problems would yield to an intellectual onslaught, that progress would continue and the millennium would come. The ordinary man, not questioning the value of knowledge, particularly scientific knowledge, eagerly purchased the self-educators and similar periodicals which enterprising publishers produced for his improvement. We find the prevailing attitude crystallized in the well-known lines of Symonds:

These things shall be! A loftier race
Than e'er the world hath known shall rise
With flame of freedom in their souls
And light of science in their eyes.

It was natural for such a generation to decree that there should be universal education, and in 1870 it was enacted that parents must cause their children to receive elementary instruction in reading, writing, and arithmetic. It was equally natural to have no doubt that the work of the schools was an intellectual activity for both teacher and pupil. Knowledge was the supreme good, or at least

the gateway towards it. Young teachers were trained above all in the art of imparting knowledge; to be able to explain the difficult topic of tides, for example, to children eleven years old was the high-water mark of competence. No doubt much good work was done, but in extreme form this stress on knowledge made schools, as Adams said, into knowledge-shops and teachers into information-mongers. Too often the teacher considered it his duty to instil by hook or by crook the largest amount of information possible. Object lessons featured prominently in the curriculum; it was important for children to learn how candles burned and what adjectives might suitably and correctly be applied to pokers. There were sets of Science Readers, one for each standard, the reading of which round the class was expected to result in sound scientific knowledge on the part of the pupils. The writer well remembers chanting in chorus with other eight-year-olds that air consisted of oxygen, nitrogen, and carbonic acid gas; he remembers also confusing the last-named constituent with a certain brand of soap used in the home. Too often children were given a mere mass of potted information as their education.

Nowadays, however, if we read or sing the words of Symonds, we are apt to exclaim, "What a mockery!" We see only too clearly that the light of science leaves unaffected the passions and wills of erring men. We have lost confidence in man and his intellect; we doubt the power of reason to provide an infallible guide to all truth or even to establish sound principles in matters of everyday conduct. Some of the scientists themselves seem to have lost their confidence: instead of being ready or nearly ready with explanations they are inclined to proclaim the mystery that they find at the

heart of the universe. Logic unaided has not so far succeeded in carrying us to the heart of reality; rather does it seem to carry us round in circles or to bring us up against the inexplicable.

It would be too much to say that there is a general recrudescence of faith, but at least a desire for faith in one form or another, a yearning for something to believe, is discernible. Sincere and earnest preachers can still fill their churches, while broadcast talks on religious and philosophical topics seem to be popular. Many adopt crude faiths that have no sound basis; creeds that are little better than the superstitions of pagan times seem to flourish in our midst. Others, more fastidious intellectually, adopt faiths that do stand up to intellectual analysis and justification. The older religious faiths are not dead, in spite of the belief of nineteenth-century intellectuals that their days were numbered by the march of science; the rationalists have not won their battle. Mere intellectualism has let us down; it has failed to deliver the goods. Nowadays, one can believe something and still feel intellectually respectable. Many have returned to the old position of the idealists and maintain that the ultimate reality is mind rather than matter and mechanism; others pin their faith to a mysterious life-force. There is genuine doubt everywhere as to the power of physical science to explain man himself.

It is not difficult to find the same tendency manifest in the schools of to-day, for they too are reacting from an overweening confidence in the value of mere intellectual training. A vast amount of work on the testing of intelligence has convinced us that all our pupils are not intellectually gifted. Even if they are, intellectual studies are regarded as insufficient. There is a sweeping

condemnation of the examination system that unduly stresses intellectual attainments, and of the homework, necessary perhaps for examinations, that crowds out the other interests of the pupil. Like Aristotle, we again realize that virtue is a state of the will rather than the intellect. Modern education regards character-training as of supreme importance, seeking to discipline the emotions, to orientate the feeling-life, emphasizing doing rather than knowing. Even religious training and Bible teaching are advocated, often by the most unexpected people. This distrust of mere intellectual instruction, especially in its extreme form of masses of information, is entirely healthy. It may well lead us to a more fruitful conception of education as a whole, and so produce results more commensurate with the efforts that have been made; for it cannot be denied that the results of seventy years of popular education are on the whole disappointing.

Twentieth-century thinkers, however, have by no means damped down their intellectual activity. Intellect as an infallible guide to ultimate reality may be discredited; unprovable postulates may in the last resort be the basis of modern thought, but man must address his logical powers to the task of inquiring whether one postulate is more credible than another, whether deductions from it are more or less consistent with observed facts. In short, intellect performs a sifting, analysing function. We read that Burke "chose his side like a fanatic and defended it like a philosopher"; we remember also St Thomas Aquinas, who, starting from certain dogmatic theological propositions, applied his acute powers of logic to defending them and following out their consequences. We too like to defend the positions we have taken up. Perhaps we deprecate

choosing a side like a fanatic; we applaud rather the virtues of fairmindedness and balance, and seek a certain poise in our philosophy. A marked tendency in present-day thought seems to be the desire to examine various creeds and philosophies in the belief that any position that holds or has held large numbers of people must contain a measure of truth. In doing so we seek to formulate a synthetic doctrine for ourselves. We are eclectics, selecting such doctrines as appeal to us in any and every school; perhaps here again we are being influenced by the prevailing notion of relativity. We emphasize likenesses rather than differences, and we lump these likenesses together, like the mathematician analysing numbers into their factors with a view to constructing common multiples.

We find clear examples of this trend in religious thought. Whereas the nineteenth century was an age of schism, the twentieth seems to be an age of reunion. The various branches of Methodism as well as of Scottish Presbyterianism have come together again, and there is a strong movement towards a much more comprehensive reunion of Christendom, however far off such a desirable goal may seem. Some go further in their effort towards synthesis, seeking and finding common ground between Christianity and other religions. A Christian philosopher such as Canon Streeter ¹ has sought to synthesize theology with science and philosophy, and Sir Oliver Lodge ² even attempted the task of reconciling physical science with his belief in the survival of human personality. Certainly there are many attempts to eliminate contradictions, to close the ranks; no one branch of knowledge or mode of thought is the complete truth, but each may contribute some-

¹ *Reality.*

² *Phantom Walls.*

thing to the rounded whole. So we try to gather up the wisdom of the ages, looking askance at the faddist, the fanatic, the single-theory man. As Mr Frank Watts¹ has pointed out, this is a return to the point of view of the Greek thinkers who abhorred anything in excess, who extolled harmony, balance, and the golden mean.

Our politics provide a further example. Gilbert's famous gibes at clear-cut even innate cleavages between Liberals and Conservatives no longer apply. There has been a breaking-down of rigid party-distinctions; it was possible after the war for a Coalition government to hold together for a number of years, and to-day most people, even although they do not subscribe to a conservative faith, find it right and proper to support a National government led by a Conservative Prime Minister. Certain it is that we have lost our faith in the old political labels; we have seen that a Prime Minister may be the leader of the Conservative party and yet be in line with the Radicals of the 'nineties. Liberals may console themselves for the lost prestige of their party by the reflection that their political philosophy now informs every government that can hope to hold office in this country. Where our fathers seldom had any doubt in casting their votes at elections we cannot believe that any one party has a monopoly of the political virtues. We would like all goodwill and wisdom to be pooled, and we act accordingly.

We see exactly the same synthetic and eclectic activity in educational practice. There are comparatively few schools in this country that can be clearly labelled by names such as Montessori, Froebel, and Dalton. We are reluctant to believe, even when struck by a new idea, that everything we have done in the

¹ *Education for Self-Realization and Social Service.*

past has been on wrong lines, and we hesitate to scrap well-worn modes of educational practice. Rather is it our genius to allow the new ideas to permeate the old, to keep what has been found to be of value in the past, adding to it what seems of value in the new. It is in this way that we hope to move forward to a more enlightened educational practice.

Lastly, we find the same synthetic trend in educational theory. If our philosophy is in any sense a synthetic one, it follows that our aims in education will also be comprehensive and synthetic. We are here setting ourselves the task of considering philosophical systems and their corresponding educational ideals that seem at first sight to diverge considerably. We do not propose merely to sit on the fence having a look round; after surveying the various fields we may have to come down into one or another; but where we can we shall try to take down the fence, or at least to make a gateway through it. For, as Welton has said,

Divergence of view as to what is man's highest good is possible only because our knowledge is fragmentary and our insight imperfect. The most opposed views as to life's issues which thinking men have advanced may be assumed to be true on their proper planes and in their right relations. Falsity comes in with exclusion: then partial truth is exalted into full truth, and one aspect of life given a dominance which a fuller knowledge would show it should not possess. To the extent to which we can see such unjustified limitations we may suggest a synthesis which would show that doctrines which are antithetical on a lower plane are really complementary on a higher.¹

In this way, neglecting nothing of value that any

¹ *What do we mean by Education?* p. 43.

important school of thought may have to contribute, we hope to arrive at an eclectic but comprehensive and inclusive philosophy of education. It may be fine and heroic to nail colours to the mast, or to defend a position to the last ditch; but our ideal is to get the best possible *credo* in education, and common sense, in line with the synthetic trend of modern thought, points to the wisdom of our plan of campaign.

REFERENCES FOR FURTHER READING

ADAMS: *Educational Theories; Evolution of Educational Theory*, Chapter I.

ADAMSON: *The Individual and the Environment*, Introduction.

DEWEY: *Democracy and Education*, Chapter XXIV.

ALDOUS HUXLEY: *Ends and Means*, Chapter XIV.

KEATINGE: *Studies in Education*, Chapter I.

NUNN: *Education: its Data and First Principles*, Chapter I.

RAYMONT: *Modern Education: its Aims and Methods*, Chapters II and III.

RUSK: *The Philosophical Bases of Education*, Chapter I.

THOMAS and LANG: *Principles of Modern Education*, Chapter I.

THOMSON: *A Modern Philosophy of Education*, Chapter I.

WATTS: *Education for Self-Realization and Social Service*, Part I, Chapter I.

WELTON: *What do we mean by Education?* Chapter I.

CHAPTER II

SOCIAL AND INDIVIDUAL AIMS IN EDUCATION

BEFORE considering the precise nature of the good at which life and education ought to aim, we propose to discuss the rival claims of the individual and of society to occupy the foreground of the picture. It seems true to say that all educational aims tend to lay stress on either the one or the other. Which has the prior claim for consideration in any political or educational system? We shall see that whether there is a real antithesis or merely a difference in stress between the two depends on the view taken of society in general and of the state in particular; if the difference is merely one of emphasis we may hope to achieve a synthesis, but it would be idle to expect that the rival aims in their extreme forms can be reconciled with one another.

Let us first consider the social aim in its most extreme form. The state is conceived of as an idealized metaphysical entity, over and above the individual citizen, superior to him in every way, transcending all his desires and aspirations. It is the embodiment of all reason and justice; it has a mission and a destiny to fulfil, and it is conscious of that mission and destiny. It has a self-sufficient morality which is, in the last resort, the good and greater glory of the state itself. Thus the aim of life in general and of education in particular is definitely the good of the state.

The logical outcome of such a philosophy is the

claim of the state to have absolute control over the lives and destinies of its individual members, the assertion of its right and its bounden duty to mould them to a pattern which makes for its own preservation and enhancement. It sees education as the most powerful means of achieving this end, and therefore devises and enforces a rigid system of state-education with no loose ends. It is supreme to dictate what shall be taught and how it shall be taught. In curriculum and method the watchwords are always discipline, organization, a willing acceptance of authority, a damping-down of individuality.

How does the individual fare in the matter of educational opportunities? The authorities seek to judge how best he will serve the state, and they train him for that end. So one receives an intellectual training, another an industrial training, another a military training, and so on; some are even definitely trained for leadership. Everything is dictated by the needs of the state. No claims of his own on the part of the individual are admitted. A poor boy, for example, will receive higher education only if it is demonstrable that such higher education will be to the benefit of the state; he has no inherent right to it.

Of all nations in history, ancient Sparta affords the most perfect example of a socialistic state. The fullest description of its educational institutions that has come down to us is to be found in Plutarch's *Life of Lycurgus*, Lycurgus being the original law-giver who lived in the ninth century B.C. Historians, however, are not agreed as to whether he was an actual historical personage. Sparta gave no consideration whatever to the individual as such; each man "was born, not for himself, but for his country." Lycurgus "taught his

citizens to think nothing more disagreeable than to live by (or for) themselves"; they "had not a wish but for their country."

Sparta was a city-state which was surrounded by powerful neighbours and had a conquered population to keep in subjection. The Spartans had invaded Greece and settled there, but they had never fused with the native population. Always they were "a garrison in conquered territory." Their aim as a state was therefore nothing more than the preservation of their own boundaries. They lived very simply, abstaining from trade and having no interest in art or literature. Most of their energies were devoted to military training; the state itself was a school, and one main duty of adult citizens was to engage actively in the training of the young.

Their immediate aim in education was to make soldiers. Boys were given a training which was "calculated to make them subject to command, to endure labour, to fight and conquer." Newly born children were examined and weaklings were exposed to die on the mountain-side—a system of ruthless but perfectly logical savagery. The more promising youngsters were given gymnastic training in running, jumping, ball-playing, throwing of discus and javelin, boxing, and wrestling. Moral training was given in the main through association with elders, who had no modern notions as to the evils that follow from repression. All independent thought and action were discouraged, and punishments were frequent and brutal. "Their whole education was an exercise of obedience." The other virtue extolled was courage; a spirit of pugnacity was fostered, and even a training in larceny was given, the penalties of detection being severe. We have Plutarch's authority for saying that the boys stole with so much

courage and caution "that one of them, having concealed a young fox under his garment, suffered the creature to tear out his bowels with his teeth and claws, choosing rather to die than to be detected."

"As for learning they had just what was absolutely necessary." Literary education seems to have been confined to reciting the laws of Lycurgus. Music was given in the chanting of passages from Homer and of patriotic songs, for "their songs had a spirit which could rouse the soul and impel it in an enthusiastic manner to action." "They consisted chiefly of the praises of heroes that had died for Sparta, or else of expressions of detestation for such wretches as had declined the glorious opportunity, and rather chose to drag on life in misery and contempt."

Alone among the ancient states Sparta seems to have given women equal opportunities with men. But this was done from strictly eugenic principles, for girls were the future mothers of warriors.

How familiar some of this sounds! It is a far cry from ancient Sparta to modern Germany, but in the latter country we have seen, both before and after the Great War, a similar philosophy of the state practised as well as preached. After the humiliating defeat of Germany by Napoleon at Jena in 1806, Fichte, professor of philosophy at Jena and afterwards Rector of the new university at Berlin, gave in the winter 1807-8 a remarkable series of *Addresses to the German Nation*, pleading that the state could regenerate itself only through education. "It is education alone," he said, "which can save us from all the evils by which we are oppressed." As the century proceeded this was taken more and more seriously. Gradually the cry of *Deutschland über alles* began to be heard; the idea of the Fatherland was

deliberately instilled in the schools, history was distorted, and the climax of the movement was, as some of us remember, definite preparation for *der Tag*. There was special training for the youth of the privileged classes, and the military caste of Junkers became very powerful and arrogant. The philosophy of the idealized state that lay behind this movement reached, as Nunn points out, "its theoretical climax in the pages of Hegel."¹ "From the idealism of Hegel more than from any other source, the Prussian mind derived its fanatical belief in the absolute value of the State, its deadly doctrine that the State can admit no moral authority greater than its own, and the corollary that the educational system, from the primary school to the university, should be used as an instrument to engrain these notions into the soul of a whole people."¹

The effectiveness of such a system of education can be judged by recent history, for Germany under Nazi rule reverted to type after its brief, abortive experiment in democracy. What was bred in the bone came out in the flesh. There is no need to describe what is only too painfully familiar—how individuality was damped down at any cost and by any method, how the press was muzzled, how foreign newspapers and broadcasts were suppressed, how unquestioning loyalty and obedience to the Nazi party and the *Führer* were all that was required of individual citizens. We are familiar too with the educational consequences of such a position in the youth movement and the schools for leaders. And once more we are experiencing the results of the pernicious doctrine that there is no moral law operative towards other states, that "the methods which a nation

¹ *Education: its Data and First Principles*, p. 3.

adopts to rise again do not matter. What matters is the goal which is achieved."¹

We have an interesting example of the Hegelian idea in the Roman Catholic and High Anglican doctrine of the Church as a spiritual entity existing in its own right, "from age to age the same," claiming absolute loyalty, obedience, and submission from its members, frowning upon all individual judgment. The dogma of the infallibility of the Pope as embodying the whole church seems to follow as a logical consequence. Such a conception must always be in sharp contrast to Protestantism, whose fundamental contentions are the responsibility of the individual to God and the notion that a society of believers constitutes a church.

In this country we are more inclined to applaud the social aim in education when it takes a form much less extreme than that outlined above. We have the watchwords "Education for Social Service," "Education for Citizenship," which mean that education should be directed in a broader, more elastic way to the good of the community. Here there is no notion of a totalitarian or idealized state. But there are many who maintain that if there is any conflict between one's individual desires and one's duties as a citizen, the latter are to occupy first place. Above all, the individual must be trained to be unselfish, to put the needs and desires of others before his own.

Professor Bagley in America has put this view very strongly, but very reasonably. For him social efficiency is the norm against which educational practice must be judged, and he considers that this aim ought to have the position of primacy in a rational theory of education.

¹ Dr Goebbels, German Minister of Propaganda, September 4, 1938.

The chief characteristics of the socially efficient individual are:

(1) Economic efficiency or ability to 'pull his own weight' in economic life; (2) negative morality, or the willingness to sacrifice his own desires when their gratification would interfere with the economic efficiency of others; (3) positive morality, or the willingness to sacrifice his own desires when their gratification would *not* contribute, directly or indirectly, to social progress.¹

Such a position is clear and emphatic, especially in its third principle of positive morality. All the activities of the individual are to be valued with reference to his social obligations.

In this country we had a marked phase of such a social criterion during the first Great War, and we are having it again. In war time it simply 'isn't done,' to enjoy oneself in any selfish way. One's pursuits have positively to contribute towards the winning of the war; it is not enough that they should be harmless, not hindering the national effort. And something of this positive spirit of service towards the country and the empire has informed the English Public Schools at their best. The 'public-school spirit' is something not to be sneered at; in its essence it is something fine, more than a worship of good form or a loyalty to the old school tie. Its perils are the cry of 'my country, right or wrong,' and a corresponding tendency to shelve the ultimate responsibility of the individual for policy in a democratic state.

So, according to this school of thought, social service is the aim in education. Schools ought to stress the duties and responsibilities of individual citizens; they

¹ *Educational Values*, pp. 107, 108.

ought to train their pupils in a spirit of cheerful, willing, and effective service. They will teach citizenship directly and also through history. They themselves will be model communities, like the family at its best, where the spirit of social service can be learned by doing. Everywhere there will be a spirit of team-work involving a certain amount of self-abnegation; always the emphasis will be laid on the community.

It may seem perverse in the face of these laudable sentiments to assert that they are not enough, but such is the cry of those who support the individual aim in education. The individual, they say, must always be in the front of the picture, and an undue stress on his duties as a citizen is putting the cart before the horse. Of course they cannot speak peaceably of those totalitarian states which demand the entire suppression of individuality and use their schools as the chief means of securing it. Social institutions, they contend, exist only to make the individual life better, fuller, richer, happier, more secure and therefore more fruitful than would otherwise be possible. The school itself is an organon of society to provide this enrichment of the individual life for the child as he is now, and to secure it for him when grown up. It is a prepared environment in which he may best blossom; its main function is to discover the good for each pupil and to devise means of attaining it.

What part does the state play when such a conception of the value of the individual prevails? We have the answer in our own country. The state emphatically asserts that there shall be education, for its schools are its main instrument for developing the individual's potentialities. But the control it exerts is of a general rather than a detailed description; there is no rigid

dictation of curricula and methods from above. The law is that children shall have instruction; it is the duty of parents to see that they have it, and that of teachers to see that they spend their time in school to advantage. Foreign critics are inclined to talk of our *laissez-faire* system of education. Certainly the state permits and even encourages individual enterprise and experiment in schools; private schools are allowed, and children may be educated at home, provided that the state is satisfied that adequate education is being given. The poor boy is supposed to have educational opportunities equal to those of his more fortunate companions, and a scholarship system attempts to translate this ideal into practice.

In England, from the days of Magna Carta onward, the rights and liberties of the individual citizen have been emphasized. Liberalism, more and more clearly formulated, has been our political philosophy, and it has pervaded all educational reform and progress. Scotland, perhaps even more than England, has asserted and put into practice the claim of the individual to the fullest self-development. Secondary education is free: university fees are comparatively low, and even these have been rendered negligible for many a poor student through the munificence of Andrew Carnegie. Parents have considered that educational opportunities for their children are worth any sacrifice, and the picture of the Highland student repairing to Aberdeen for the winter with his bag of meal and his cask of herrings is familiar. Barrie in *Mary Rose* has given us an unforgettable picture of such a student providing himself with the means of subsistence during the summer vacation. In England the problem has been more complex, but the ideal has been, and is, similar. We see the prevailing liberalism in

the recent Board of Education Report on Secondary Education, which declares that

Schools of every type fulfil their proper purpose in so far as they foster the free growth of individuality, helping every boy and girl to achieve the highest degree of individual development of which he or she is capable in and through the life of a society.¹

We see it again in the title of 'Suggestions' with which the admirable handbook issued to teachers by the Board of Education is labelled. His Majesty's Inspectors of Schools make suggestions rather than issue fiats. In the name of the state they advise rather than command. Having satisfied themselves that teachers are conscientiously trying to carry out the work entrusted to them, they adopt a paternal rather than a dictatorial attitude.

Popular education in England began with the notion that "we must educate our masters." The dominant or dormant liberalism of our political philosophy had carried the day for repeated extensions of the franchise, and it was seen clearly that the electors must have at least a minimum of education, if only to absorb the political opinions of their betters from newspapers. But soon the dominant individualistic trend caused an extension of the curriculum beyond the three 'R's.' The sound of pianos from elementary schools may have caused a scandal in certain quarters—that was going too far with the children of the common people—but the pianos came to stay. More and more the right of the individual to self-development became the watchword. And this persists, whatever political party may be in power, Conservative, Liberal, or Labour. It is only the pace that varies. The Labour party is some-

¹ *Spens Report*, p. 362.

times seen by its critics to be facing towards a bureaucratic, over-regulated state, but it has never failed to make a strong claim for the educational opportunities of the individual, especially the poor individual.

The individual aim in education has been clearly and emphatically expressed by Sir Percy Nunn, the leading educational philosopher of this generation in England. His book *Education: its Data and First Principles* crystallizes the dominant philosophy of the individual as applied to education and constitutes a masterly defence of it. He shows that British philosophy has been individualistic from the time of Hobbes onward, and he himself, though not accepting the exaggerated individualism of the writer of *The Leviathan*, wholeheartedly concurs with the emphasis on the individual rather than on society. He stands on the position "that nothing good enters into the human world except in and through the free activities of individual men and women, and that educational practice must be shaped to accord with that truth";¹ he wants a doctrine which "reasserts the importance of the individual and safeguards his indefeasible rights."² Education must secure for everyone "the conditions under which individuality is most completely developed"; it must enable him "to make his original contribution to the variegated whole of human life as full and as truly characteristic as his nature permits; the form of the contribution being left to the individual as something which each must, in living and by living, forge out for himself."³

It would seem to follow that beyond this ideal of developed individuality there can be no universal statement of the aim of education, that there is in a very

¹ *Education: its Data and First Principles*, p. 4.

² *Ibid.*, p. 4.

³ *Ibid.*, p. 5.

real sense a unique aim for each individual. No one formula will suffice for 'the good.' "For *A*'s idea of a fine character turns out to be either ridiculous or rankly offensive to *B*; what *C* regards as complete living would be a spiritual death for *D*; while the *mens sana in corpore sano* that *E* reveres, *F* loathes as the soul of a prig housed in the body of a barbarian."¹

After proclaiming his aim from a philosophical standpoint in his first chapter, Nunn, in his second, appeals to biology for support. In the world of living things he sees each creature, each species, striving, as it were, towards greater perfection of form and function; he therefore claims that his aim is "according to nature." Perhaps such an appeal has given rise to a certain misunderstanding among his critics, who have accused him of an undue tendency towards naturalism in his educational philosophy. It is important to realize that, although he seeks and finds biological support, it is from philosophy, not from biological principles, that he deduces his aim in the first instance. Perhaps his use of the term 'individuality' has contributed to such a misunderstanding, for in biology it usually means the state of being an individual, having separate existence. But for Nunn individuality is an ideal, a goal, something that is not yet; it is the spiritual perfection possible to each individual. At no stage of his development has the individual attained his full individuality; he must be continually striving towards the mark.

It may possibly be clearer to say that the aim is self-realization, meaning by that term the making real or actual the highest possibilities of the self. This is, for each self, the work of a lifetime, possibly of eternity. But the term 'self-realization' in turn needs its safe-

¹ *Education: its Data and First Principles*, p. 1.

guards, for it is too easily confused with 'self-expression' which in many quarters to-day connotes a claim to untrammelled freedom, a claim always to act as nature prompts, although the results may be thoroughly objectionable to other people. Thus it must be clearly understood that the 'self' in 'self-realization' is not the present unsatisfactory and undisciplined self, but the potential, fully-developed self that is to be. Let us then, if we support the individual aim, be clear that by 'individuality' and 'self' we have in mind ideals not yet attained, the attainment of which is the end not only of education but of life.

We would do well to accept the warning of Eucken that 'individuality' must not mean "the supremacy of the free subject over against the social environment,"¹ but rather the spiritual individuality which the individual acquires through "his inner strengthening by an inner world present to him,"² and through "his elevation by a spirituality transcending nature."³ Along with this we may accept his conception of personality, which must be "regarded as the bearer of a new life in contrast to that of nature, and not simply as something added to nature."⁴ Neither is spiritual individuality "something given to a man in the natural characteristics which he brings with him into life,"⁵ nor are we men personalities from the beginning. "We bear within us simply the potentiality of becoming a personality. Whether we shall realize our personality is decided by our own work; it depends primarily upon the extent to which we succeed in striving beyond the given existence to a state of self-determining activity."⁶ So Eucken proclaims "that the

¹ *Life's Basis and Life's Ideal*, p. 96. ² *Ibid.*, p. 370. ³ *Ibid.*, p. 370.

⁴ *Ibid.*, p. 132.

⁵ *Ibid.*, p. 132.

⁶ *Ibid.*, p. 310.

chief movement of our life is to win a genuine being, and that in the development of personality and spiritual individuality such a being is in question";¹ that life as a whole is "the task of winning our own being completely."² "Every individual has such a life-embracing task in the cultivation of a genuine personality and a spiritual individuality."³

Eucken's 'spiritual individuality' and 'personality' are thus seen to be entirely free from any biological associations that 'individuality' may possess; and it is equally clear that they are goals, not starting-points. The only meaning of the individual aim in education that is worthy of our acceptance is the development of valuable personality and spiritual individuality. As we proceed we shall have more to say of what the criterion of value may be; meantime we may note the underlying belief that a human personality developed to its maximum spiritual possibilities is the finest thing in life, the noblest work of God. We may well believe, with Eucken, that the aim of education, as of life, is "to exalt personality."

How far is it possible to strike a balance between individual and social aims in education? Let it be said at once that there is no possible synthesis of education for individuality and education for the enhancement of a totalitarian state; they are poles apart and must be so from the nature of things. But there is nothing novel in a synthesis of the ideals of social service and individual development. The age of Pericles, the Golden Age of Greece, was an era of unparalleled individual achievement in literature, art, mathematics, and philosophy, as well as in public life; it was certainly a time when the claims of the individual needed no urging. But the

¹ *Life's Basis and Life's Ideal*, p. 371. ² *Ibid.*, p. 371. ³ *Ibid.*, p. 245.

great orator, as we learn from Thucydides' setting forth of the ideals and results of Athenian education, claimed that the greatness of the city itself was due to her democratic institutions. In magnifying the city he was magnifying the men "whose virtues made her glorious." The noblest citizens were enlisted in the service of the state: as for the rank and file, if few were originators, all were sound judges of a policy. An Athenian citizen did not neglect the state because he took care of his own household. The great educational theorists of Greece strove hard to reconcile the claims of the individual with those of the state, and their discussions are as fresh and helpful to-day as they must have been when they were written. The interests of the state were enhanced by the development of virtue and wisdom in the individual, and individuals found their best chance of self-development in the service of the state.

It is, in fact, only in a social medium that individuality of value can be fostered and personality exalted. "The real self is the bipolar self, the social self, the socius,"¹ says J. M. Baldwin; "the 'ego' and the 'alter' are born together."² Personality cannot be "expressed in any but social terms."³ The term, as Adams says, "nearly always implies a reference to the way in which the individual concerned reacts upon other individuals,"⁴ and, as he reminds us, it is connected in its derivation with the *persona*, the combination of mask and megaphone through which the actor in Greek and Roman theatres impressed his audience.⁵ When we speak of a strong, or a weak, or a charming, or a colourless personality we are referring to the way

¹ *Social and Ethical Interpretations in Mental Development*, p. 30.

² *Ibid.*, p. 15.

³ *Ibid.*, p. 27.

⁴ *Modern Developments in Educational Practice*, p. 114.

⁵ *Ibid.*, p. 115.

in which an individual affects other people, and assessing the degree and quality of his impressiveness. So personality implies those social contacts without which, indeed, we should be less than human. The wild boy of Aveyron, who had been roaming a French forest, leading a solitary existence all the eleven or twelve years of his life, was little more than an animal when he was found in 1799; and Itard, one of the greatest of teachers, failed, in spite of unlimited patience and skill, to bring him to anything approaching normality. Man's nature is "social as truly as it is self-regarding";¹ "we are all members one of another."²

Thus individuality is of no value, and personality is a meaningless term apart from the social environment in which they are developed and made manifest. Self-realization can be achieved only through social service, and social ideals of real value can come into being only through free individuals who have developed valuable individuality. The circle cannot be broken.

We have the truest and highest synthesis of the two ideals in Christianity. No one more than its Founder ever exalted the importance and value of the individual human soul in the scheme of things, yet He it was who taught that the way of personal salvation is the way of sacrifice and self-abnegation. "He that loseth his life for my sake shall find it,"³ Jesus Himself, on any theory the outstanding personality in the history of mankind, lived and died in perfect service and devotion to His fellows. If His message as to the nature of the moral universe is true, then indeed there is no conflict between self-realization and social service as aims of life and education, for they are one.

¹ Nunn: *Education: its Data and First Principles*, p. 4.

² *Ephesians*, IV, 25.

³ *Matthew*, X, 39.

If we believe this we may seek to make our schools communities where individuality is not damped down, but fostered through social contacts and opportunities of service; where the distinctive contribution of each and every member is welcomed and encouraged. Such is the ideal that inspires our schools at their best; it ought to be accepted as a fundamental principle by all. It is highly satisfactory to note that the Consultative Committee on Secondary Education "find it impossible to believe that a community . . . has not everything to gain from the free growth of individuality among its potential citizens."¹

REFERENCES FOR FURTHER READING

ADAMS: *Evolution of Educational Theory*, Chapter V.

BAGLEY: *Educational Values*.

BOARD OF EDUCATION: *The Spens Report*.

EUCKEN: *Life's Basis and Life's Ideal*.

NUNN: *Education: its Data and First Principles*, Chapters I and XV.

F. H. SPENCER: *Education for the People*.

WATTS: *Education for Self-Realization and Social Service*, Part I, Chapter II.

WELTON: *Principles and Methods of Teaching*, Chapter I.

¹ *Spens Report*, p. 151.

CHAPTER III

THE PHILOSOPHICAL PROBLEM

WE saw at an early stage that the main problems of philosophy are two. Firstly, we have the metaphysical problem concerning the nature of reality itself; secondly, the human problem concerning the nature of man. Views on the former can be labelled as monistic, dualistic, or pluralistic according as reality is conceived to consist of one or two or several substances. Generally speaking, monism has always been favoured by philosophers; they have sought to reduce the world-stuff to one substance, and have considered dualistic and pluralistic views unsatisfactory. Thales, the father of Greek philosophy, suggested water as the ultimate substance; his successors put forward air or fire; while the later Greeks reached the notion of atoms or little indivisible particles.

But dualism is a popular view. It is quite a natural theory, for we seem to live in two worlds, namely, the world of things, and the world of our own inner experience. Thus the two substances of dualism are, in the metaphysical problem, matter and mind; applied to the human problem, since the body consists of material substance, they become body, on the one hand, and soul or mind, on the other. Primitive man seems to have stressed the body, regarding the soul as a thin, insubstantial duplicate of it. The great philosopher Descartes was frankly a dualist for whom man was a body plus a soul; his complete separation of the two,

coupled with his great authority, made it very difficult for later monistic thinkers to bring them together again. The doctrine of psychophysical dualism, that mind and body are two different realities with different sets of properties, is commonly held. But the close connexion of the mind with the brain can never escape notice. Mental events and brain events seem to be parallel to each other and to take place with a one-to-one correspondence. The nature of and the reason for this psychophysical parallelism constitute the inscrutable psychophysical or mind-body problem. Mind and body seem to interact with each other, so we have the doctrine of interaction, namely that mental events are caused by bodily events and *vice versa*. It is difficult, however, to conceive of events in the body being caused by events in the mind if the two are really separate, self-contained entities, or to suppose that there is an influx and efflux of energy from the one to the other. To get over such difficulties we have had an identity hypothesis, suggesting that mind and body as we know them are different aspects of an identical reality underlying both, whatever the nature of that reality may be. Those who maintain such an hypothesis are, of course, monists. But other monists seek either to reduce mind to matter or matter to mind. Their positions are, respectively, materialism and idealism.

Materialism is, then, one main school of monism. In its simplest, most naïve form, it asserts that matter is the stuff of the universe, and that what we call mind is either a form of matter, or a property of matter, or both. Mind is, in short, the brain and its working. Experience or consciousness is to the materialist, when he does not ignore it altogether, a mere by-product, a sort of phosphorescent glow accompanying the functioning

of the material organ, the brain. Materialism appeared in ancient Greece in the conception that atoms, empty space, and motion were the fundamental postulates by means of which other things were to be explained. In modern times materialism has again taken atoms, space, and the Newtonian laws of motion, and asserted that everything can be reduced to them. The notion of mechanism is always prominent; the universe itself is a great machine which was once wound up and is now running down, and living beings in the last resort are merely complexes of atoms and molecules operated on by mechanical laws. Attempts, so far unsuccessful, have been made to synthesize a living cell; given that, the materialist believes that the mechanical principle of natural selection would eventually produce higher forms of life. So man himself in the last resort is a mechanical creature. There is no creative force, no purpose, no direction. Clearly the behaviourist psychology is the foster child of materialism and mechanicalism.

The strength of materialistic and mechanistic conceptions of the universe in general, and of life in particular, has lain in the enormous success of physical science in the nineteenth century, its exact character, its power to predict events. But twentieth-century work in science can hardly be said to have strengthened the materialist's position; it has at least made it difficult to subscribe to the simple form of it which we have outlined. The classical notion of the atom as a hard, indivisible particle was being abandoned even in the nineteenth century; thus, for example, we had the famous attempt of Lord Kelvin to explain the nature and properties of matter in terms of vortex rings in a hypothetical ether. Then came the discovery of

radioactivity and the disintegration of the atom. Atoms, it appeared, had complex structures and were resolvable into electrons and protons which, we were told, were negative and positive charges of electricity. Electricity then became the fundamental notion, and no one knew what its ultimate nature was. Perhaps energy was the fundamental thing, but what, in turn, was energy? Was this energy, found in the physical world, identical with the mental energy, the drive or urge within us, of which we are conscious? Such a question had no meaning for the crude materialist, but he could not say what physical energy was. Or was man, in his notion of physical energy, just reading himself into external nature, seeking unconsciously to interpret it in terms of himself? Was it the last relic of his early anthropomorphism? Some scientists, perceiving this danger, would have nothing to do with the notion of physical energy and ordered its banishment from physical science. Whatever the solution of these and other difficulties may be, it is undeniably true to say that, since matter has resolved itself into a complex of unanalysable notions such as electricity, energy, and ether, materialism has lost its old, beautiful simplicity. Philosophical materialism soon gets into difficulties, and it is to-day, in its crude form, untenable.

But if a naïve materialism is rapidly losing its adherents, this cannot so clearly be said of the philosophical doctrine called naturalism. Naturalism is a difficult term which is used in many senses; as a philosophical view its meaning seems to take two main forms. One of these is closely allied to the mechanistic materialism which we have described; perhaps it concerns itself less with the nature of matter and more with the mechanical nature of the world movement. If it is

difficult to be dogmatic about matter to-day, it is less difficult to proclaim the triumphs of physical science in the discovery of the laws that prevail in the physical universe. This first form of naturalism takes these laws for granted and believes that they must underlie the life, thought, and history of man; they do explain man's environment, and they ought to explain him. He is the result of the action of that environment in accordance with the strict laws of natural selection and consequent survival of the fittest. This naturalism of physical science starts with external nature and tries to fit man into the picture of the universe as painted by science.

There is, however, another form of naturalism that is not founded on a mechanistic conception of life. Since it calls to its aid the biological rather than the physical sciences, we may call it biological naturalism. It starts with the notion of life as its ultimate datum, and tries to explain man as the highest form of life, as the last word up-to-date in the evolutionary process. Man, the highest of the animals, is to be accounted for in terms of the lower and simpler forms of life from which he has evolved. Although such a view always tends to emphasize the past history rather than the future goal of the race and the individual, it need not do so. It is, as we shall see, of great importance in the theory and practice of present-day education.

Such a naturalistic view finds its foundation in the writings of Lamarck, the famous French biologist, who, noting the fact of evolution, offered an explanation in terms of the drive within the living creature to adapt himself to his surroundings. Samuel Butler, reacting vigorously against the alternative Darwinian explanation of evolution in terms of the winnowing, sifting action of the environment, belonged to this school of

naturalism; while to-day we have Bernard Shaw providing an exposition of it in *Back to Methuselah*. Nunn, since he seeks strength for his educational philosophy of individuality by an appeal to biology and by the formulation of a biological psychology, is seen by some to be in the ranks of such naturalists; but a careful reading of his work brings the present writer to the conclusion that such a naturalism is contributory rather than fundamental in his philosophy. McDougall, in his earlier works at least, sought a complete explanation of man's behaviour and its motives, his desires, aspirations, volitions, and ideals in terms of the instincts common to him and the animals; given the instincts to start with, the other things were seen to follow. Generally speaking, biological naturalism starts with a notion of life-force, *élan vital*, *libido*, instincts, *horme* and *mneme*, or whatever name may be used, and sees how far it can proceed in its explanation of man in terms of such an assumption.

There are, then, two main forms of naturalism, (a) the naturalism of the physical sciences which looks outward to external nature and tries to fit life, mind, and man into such a framework; and (b) biological naturalism which makes or assumes the results of a direct study of life itself, and seeks to explain man in terms of lower forms of life. The former gets into grave difficulties in its attempts to account for man. To the baffling question of an ancient philosopher: "What is my soul in a boundless creation?"¹ it can provide no answer. Everywhere the vast universe seems inimical to life. We are told by some that, viewed objectively, it seems the merest accident, cosmically, that on this small, insignificant planet of ours conditions should

¹ *Ecclesiasticus*, XVI, 17.

obtain where life is possible, and that the probability that life exists elsewhere is infinitesimally small. Human life, thought, and purpose cannot be important in the scheme of things; it is unthinkable that the purpose of the vast cosmos, if any, should be to provide a setting for us. Such a naturalism can give only the view that man is negligible.

But a biological naturalism does not so easily get into difficulties. It is undeniable that an approach such as that of McDougall is plausible, and that it does take us a long way in providing a believable account of man's behaviour and its motives. No doubt many of us feel that it becomes somewhat strained when it attempts the explanation of man's higher aspirations and longings, his desires for goodness, beauty, and truth. No doubt it tends to assume that the nature which man to some extent shares with the animals is his true nature, or even that the body which is inherited from pre-human ancestors is the real man; no doubt many forms of it emphasize man's origins rather than his goal. Yet it must be treated with respect, and those who find it unacceptable, or at least inadequate, must have an alternative philosophy clearly formulated.

Idealism

We have such an alternative in idealism or, as it is sometimes called, spiritualism. Idealistic philosophy takes many and varied forms, but the postulate underlying all is that mind or spirit is the essential world-stuff, that the true reality is of a mental character. Experience, thought, ideals, values, personality, which are mental in nature, are stressed and believed to be nearer the heart of the universe than material things, or the world of external nature, or the lower animal creation. Idealism, therefore, denies emphatically that the mind is merely the brain and its working, or that

consciousness is in any way a by-product; it rather asserts that mind itself is the fundamentally real thing. As Rusk succinctly puts it, "Instead of, like naturalism, asking 'Why has the body a mind?' it asks 'Why has the mind a body?'"¹

Whatever may be the answer to the latter question, idealism always considers man's mind as much more important than his body, as more important even than the vast universe of the astronomers.

All idealists since Socrates have considered man himself a more important study than external nature. When twitted by Phaedrus with never venturing outside the gates of Athens the master is reported to have replied: "Very true, my good friend; and I hope that you will excuse me when you hear the reason, which is, that I am a lover of knowledge, and the men who dwell in the city are my teachers, and not the trees, or the country."² This is the core of the idealist position that reality is to be found in man's mind rather than in external nature. The idealist of to-day views undismayed the boundless universe revealed to him by astronomy, and calmly asserts that the mind which can contemplate it and seek to unravel its mysteries is greater than the thing contemplated.

In one form of idealism there features prominently the great assumption that the universe is rational. Here idealism has a certain amount of common ground with science, for the fundamental postulate of the latter must always be the existence of law, the uniformity of nature. But idealism goes beyond science in attributing this orderly working of the universe not to any set of mechanical principles but rather to the existence of universal mind. Thus Fechner taught that the universe

¹ *The Philosophical Bases of Education*, p. 29.

² Plato: *Phaedrus*, 230.

itself is a great organism having a body and a soul, and that the physical aspect of it is the outer expression of the universal mind, "the living visible garment of God"; while the absolute idealism of Hegel conceived of the universe as a great thought process, as God thinking, the physical universe being thought externalized and made visible. It is through our art, philosophy, and religion that we may hope to get into touch with this absolute thought.

Other forms of idealism have conceived of the physical world as constituted, in the last resort, of mind-stuff, making the assumption that the ultimate elements of so-called matter have a mental character. The doctrine of panpsychism was that all reality is psychic in nature, that every atom has life, mind, and energy. For Leibnitz matter was in its essence mental or spiritual; atoms were not little hard, material particles but monads, which were psychical entities, little souls, centres of force. The human body was thus made up of monads, the mind being a governing monad. Certainly the monad theory had no difficulty in bringing mind into the picture; and it does not seem so very extraordinary in these days when atoms are conceived of as energy systems and when many physicists suppose "that there is no determinism in events in which atoms are involved singly,"¹ when science "has no longer any unanswerable arguments to bring against our innate conviction of free-will."²

A third form of idealism considers the possibility that the physical world may be merely a phenomenon or appearance to the perceiving mind. Such a notion took extreme form in subjective idealism, or subjectivism, usually associated with the name of Bishop Berkeley,

¹ Jeans: *The Mysterious Universe*, p. 28.

² *Ibid.*, p. 29.

the famous Irish philosopher who very effectively turned the tables on the materialists of his day so far as philosophical argument was concerned. Subjective idealism contends that things exist and have reality only when they are being perceived, and that they have no existence apart from my mind, your mind, or a universal mind, which is perceiving them. Indeed the strict subjective idealist would consider that things have existence only when they are being perceived by his own mind. What shall we say about this emphatic and extreme statement of the view that the world is a mental world, that the true reality, the only reality, is mind? Clearly we must allow that it cannot be disproved by strict logic, for it is certain that if an external world exists we can know it only through our perceptions of it. How can we know that there is any reality beyond our perceptions, giving rise to them? In argument we are bound to admit that we only assume the existence of such a reality, that we cannot in the last resort prove it, nor can any scientist.

In his *Critique of Pure Reason* Kant taught that we can study the world only as phenomena or appearances to mind. He did not, however, deny the objective reality of the *Ding an sich* which lay behind the phenomena; he said only that we could not know it in itself. Thus his phenomenalism is not subjective idealism. He taught further, in his *Critique of Practical Reason*, that there is a *noumenal* or real world of which we can and do have direct knowledge—the world of experience, of conscience, of duty, of moral values. So Kant, while not denying the existence of the physical world itself, occupies an honoured place among the great idealists.

The ordinary man, of course, will not have it that extreme subjective idealism can possibly be right. The

world we perceive must have real existence apart from the mind that perceives it, for anything else is contrary to common sense. His views constitute the philosophical doctrine of realism, which quite simply affirms the existence of an external world, and is therefore the antithesis of subjective idealism. Although Monsignor Ronald Knox tells us that

There once was a man who said, "God
Must think it exceedingly odd
If He finds that this tree
Continues to be
When there's no one about in the Quad,"

most of us would find it exceedingly difficult to believe that the tree ceases to exist when we go away. Of course we must accept Kant's warning against a naïve realism which assumes that the external world is exactly as it appears to us; but it is probably true to say that modern science needs no such warning. No doubt science assumes the truth of the realistic view, as it must if it is not to stultify itself; but it can conscientiously leave open the question of the ultimate nature of the reality behind the phenomena which it studies, whether it is material or mental. Scientists to-day, when they turn their attention to the problems of philosophy, need not necessarily be materialists. They may believe that there is something akin to mind in their electrons; they may, like Sir James Jeans, see the universe "more like a great thought than a great machine," a manifestation of that mode of thought that we call pure mathematics, and propound the startling theory that the architect of the universe must be a great mathematician.

At one time such notions would have been considered fantastic and unworthy of consideration, but such is

not the case to-day. We have already noted that the old notion of matter as consisting simply of atoms has gone, and that atoms themselves have been resolved into complex systems of insubstantial charges of electricity. The methods of physical science can shed no light on the true nature of these ultimate constituents; here observation ends and speculation begins. Pope in his day could proclaim that

Nature, and Nature's laws, lay hid in night:
God said "Let Newton be!" and all was light,

but there is much point to-day in the witty, if pessimistic rejoinder of J. C. Squire:

It did not last: the Devil, howling "Ho!
Let Einstein be!" restored the *status quo*.

Physicists and astronomers of to-day are more and more inclined to limit themselves to the task of describing the working of the universe in terms of mathematics. Their success in this stupendous undertaking takes our breath away, for they have very largely succeeded in providing the mathematical description they have sought, reducing the universe to systems of equations. But in these equations they cannot say what the x stands for: as regards the inner nature of things most of them admit that their knowledge is an empty shell, that it is a knowledge of form rather than of content. What is the great unknown, the very stuff of the universe? Some give the question up, and deny that it is their business to answer it; others, like Sir Arthur Eddington, proclaim their belief that it must surely be our mind-stuff, that the idealists have been right all along, the materialists hopelessly wrong. "We have found a strange footprint on the shores of the unknown. We have devised

profound theories, one after another, to account for its origin. At last, we have succeeded in reconstructing the creature that made the foot-print. And lo! it is our own."¹ Even the possibility of subjective idealism is admitted by Sir James Jeans:

And ever the old question obtrudes itself as to whether the infant [*i.e.*, man] has any means of knowing that it is not dreaming all the time. The picture it sees may be merely a creation of its own mind, in which nothing exists except itself; the universe which we study with such care may be a dream, and we brain-cells in the mind of the dreamer.²

Idealism has always been an attractive view of life to those to whom materialism and all its implications are abhorrent. It has been defended by all the great philosophers, and, as we have seen, it is intellectually respectable even in a scientific age to adhere to it. We have seen too that the days are gone when materialism and the scientific attitude were identical, and that to-day a crude materialism is as dead as the proverbial door-nail. No longer do scientists necessarily frown on the notions of mind and God simply because they cannot find a place for them in a materialistic conception, or regard idealistic systems of philosophy as the irresponsible dreams of men who have not taken the trouble to study science. But let us be clear about the position of the present-day idealist. While cordially welcoming any support scientists may give, he does not turn to them for proof. Whatever science may say, he denies the supreme importance of matter and mechanism, and the power of such conceptions to explain man. Further, he finds any

¹ *Space, Time and Gravitation*, p. 201.

² *Eos, or the Wider Aspects of Cosmogony*, p. 88.

biological account of man in terms of his evolution from lower forms of life totally inadequate; he considers that logic, psychology, aesthetics, and religion are likely to provide a better clue to the true nature of man than any biological studies. He contends that there is an inner harmony between the soul of man and the heart of the universe; he regards man's mind as no mere incident, no by-product thrown up by merest chance in a universe that is hostile to life, purpose, and aspiration, but as itself the real thing, in touch with the eternal. For him man is essentially a spiritual being whose main aim in life must be to develop his spiritual nature. Even if the mathematical idealism of Jeans were proved up to the hilt, and generally accepted by scientists, our idealist would find it insufficient as a basis for his philosophy. Jeans proclaims that he has discovered abstract thought at the heart of the universe, but he has nothing to say of feeling, or morality, or beauty; it is all cold, logical thought. Idealists must have an account of man's aesthetic and moral values, and for this they may turn, as their predecessors did, to the philosophy of Plato.

There is no theory of moral values more satisfying, more lofty, possibly more true, than that to be found in the Platonic dialogues. If we inquire into the background against which they were written, we find that the teaching of the sophists had spread the notion that right and wrong were mere matters of expediency and in expediency, that what was right at one time and in one place might be wrong at another time and in another place, and *vice versa*. Socrates is represented in the dialogues as contesting the notion that there are no absolute moral values, and as seeking abiding standards for moral judgments. These could not be found from

considerations of expediency; nor could they be found from tradition, for exceptional cases could always be cited. So he, or his disciple and interpreter, Plato, or both, believed in and taught the eternal validity of moral principles, maintaining that rightness, justice, courage, and so on, had permanent natures.

To make Plato's doctrine clear we cannot do better than quote and comment upon his famous metaphor of the cave:¹

Behold! human beings living in an underground den which has a mouth open towards the light and reaching all along the den; they have been here from their childhood, and have their legs and necks chained so that they cannot move, and can only see before them; for the chains are arranged in such a manner as to prevent them turning round their heads. Above and behind them the light of a fire is blazing at a distance, and between the fire and the prisoners there is a raised way; and you will see, if you look, a low wall built along the way, like the screen which marionette players have in front of them, over which they show the puppets.

There are "men passing along the wall, some apparently talking and others silent, carrying vessels, and statues and figures of animals made of wood and stone and various materials, which appear over the wall." The prisoners "see only their own shadows, or the shadows of one another, which the fire throws on the opposite wall of the cave . . . and of the objects which are being carried in like manner they only see the shadows."

The metaphor describes the conditions under which our lives are lived. The only knowledge the prisoners can have of the events outside the cave is by watching the shadows cast by these events; but if a prisoner can so

¹ *Republic*, VII, 514.

far escape from the chains as to be able to turn round he sees, to some extent, the real events themselves; if, further, he escapes from the cave altogether and gets outside he has full knowledge of them. Most of us are like the firmly chained prisoners, and it is natural for us to take the shadows for reality itself; our reason, however, may help us to interpret the shadows and to infer the nature of the reality that casts them. Those who attempt this interpretation are the philosophers; eventually they may be able to turn round, and even get outside.

Now the reality corresponding to the events outside the cave consists of permanent natures, forms, essences, or ideas; and the shadows are the particular men or particular actions which we perceive by our bodily senses. The philosopher, by his reason and understanding, thinks that in the particular men and particular actions he recognizes natures which he knows; but such knowledge of the true realities comes not through his senses but through his understanding. He it is who "is able to distinguish the idea from the objects which participate in the idea, neither putting the objects in the place of the idea nor the idea in the place of the objects."¹ He is wide awake, not a dreamer.

Besides the ever-changing world of sensible things or phenomena there is, for Plato, another world of eternal forms or natures about which men can gain true knowledge through their reason; indeed, the possibility of such knowledge is presupposed in the very opinions they hold about sensible things. "Phenomena take the names of the Ideas as they participate in them."² Plato makes his doctrine very clear in a somewhat homely example.³ There are many beds and tables in the world,

¹ *Republic*, V, 476.

² *Phaedo*, 102.

³ *Republic*, X, 596, 597.

but there are only two ideas or forms of them, one the idea of a bed, the other the idea of a table. The artificer of a bed or table does not make the idea of a bed or table, but the article which he makes is in accordance with the idea. He does not make true existence, but only some semblance of existence. The true idea exists in the nature of things; it is made by God, for no one else can be the maker. Plato was a great mathematician, and his theory of reality always finds an echo in the mind of one who has studied mathematics. The mathematician is familiar with the distinction between the imperfect circle which he can actually draw and the ideal circle that he knows through his reason; he regards the latter as the true form which exists in the nature of things, and the former as merely a rough copy of it. However carefully he may draw a triangle and however accurately he may measure its angles, he finds that the angle-sum is only approximately two right angles; but he knows through his reason that in a Euclidean space the angle-sum is two right angles exactly.

It is, then, the universal forms, ideas, patterns, or essences, rather than the phenomena which are their imperfect copies, that constitute the inner reality of the universe. They do not come into being or pass away; they are from everlasting to everlasting; and they alone are the objects of true knowledge. So the idealism of Plato is objective. Because of his affirmation that ideas are real we have the name 'realism'¹ applied to his doctrine; but it is important to be clear that the notion of reality is applied to ideas, not to the external world.

It is, however, in its working out as a philosophy of aesthetic and moral values that the Platonic idealism

¹ Not to be confused with the realism of p. 64.

is of outstanding importance in life and in education. These values have real, independent existence in an eternal world beyond that which we perceive with our senses. They do not need to be accounted for; they do not need to be fitted into the framework of physical science or explained away in a naturalistic picture of man, for they are the true reality. "There exists an absolute beauty, and an absolute good, and an absolute greatness, and so on."¹ And everything which we truly judge to be good or beautiful in this world is good or beautiful simply because it partakes of the nature of absolute goodness or beauty.

There is an absolute beauty and an absolute good, and of the other things to which the term 'many' is applied there is an absolute; for they may be brought under a single idea, which is called the essence of each.²

If anything besides absolute beauty is beautiful, it is so simply because it partakes of absolute beauty: . . . the thing is only made beautiful by the presence or communication, or whatever you please to call it, of absolute beauty: . . . it is absolute beauty which makes all beautiful things beautiful.³

But Plato went further than this, finding it necessary to postulate a principle of unification among his eternal ideas. He found this to be the Form or Idea of the Good,⁴ the supreme reality from which all others derive their being, "the universal author of all things beautiful and right."⁵ Its apprehension comes as a sudden revelation, as a beatific, mystical vision, after a long process of contemplation of the lesser forms. This is what Christian philosophers have meant by God. Although in Plato the supreme reality is never said to be God,⁶

¹ *Phaedo*, 100.

² *Republic*, VI, 507.

³ *Phaedo*, 100.

⁴ See *Republic*, VII, 508, 509.

⁵ *Republic*, VII, 517.

⁶ Taylor: *Plato: the Man and his Work*, p. 289.

Platonism can lead us to the idea of God and to the notion that the eternal forms, the absolute values, are His attributes. Man's soul is made in the likeness of the supreme Being, participating in the eternity of the forms; it is a link between the ideal, eternal world and the world of space and time. Most of Christian philosophy is essentially Platonic in conception: it must certainly have been an early Christian Platonist who wrote the Prologue to the Fourth Gospel. But Christian philosophy, starting with the assertion that "the Word was made flesh and dwelt among us," has something much more to say than Platonism. In the fulness of time the attributes of God, the Word, the eternal values, were embodied and shown forth in a human life so that we might behold their glory.

It was Plato who gave the first reasoned statement of the vision and the hope that beyond this world and this life there are another world and another life more true, more beautiful, and more real, which we now see "through a glass, darkly," but which we shall see hereafter in all their glory. It is this eternal world that gives us the moral standards which our reason enables us to recognize and follow.

Platonism is equally satisfying as a philosophy of aesthetics. Although the good and the beautiful are not clearly distinguished from each other in the dialogues, we may, if we care, think of them separately. As we have seen, everything beautiful on earth is conceived of as a copy to a greater or less extent of eternal beauty, as a sensible embodiment of that form. Paint, stone, and sound-waves are merely the materials out of which beautiful pictures, cathedrals, and symphonies are made; they are not the beauty itself. Nor is even the picture or cathedral or symphony itself the real

beauty, for that has existence only in the eternal world. But the true artist, himself having had a vision of absolute beauty, nails it down in sensible form so that we, in contemplating his work of art, may also be led to that vision. Thus, if the Platonic doctrine is found believable, it is not fanciful talk, but sober fact, to say that when we are overawed by the unearthly beauty of Chartres Cathedral, where Napoleon said no one could possibly be an atheist, we are to some extent inhabiting the heavenly temples; or that when we are carried out of ourselves by the glory of the *Sanctus* in Bach's *Mass* we are indeed hearing echoes of the choirs invisible. The architect and the composer have led us straight to the heart of things.

True appreciation and love of beauty consist in our being led through the contemplation of beautiful things to the vision of absolute beauty itself. We are told that we may eventually and quite suddenly attain this vision.

[He] who has learned to see the beautiful in due order and succession, when he comes toward the end, will suddenly perceive a nature of wondrous beauty . . . a nature which in the first place is everlasting, not growing and decaying, or waxing and waning ; in the next place not fair in one point of view and foul in another, or at one time or in one relation or at one place fair, at another time or in another relation or at another place foul, as if fair to some and foul to others, . . . but beauty only, absolute, separate, simple, and everlasting, which, without diminution and without increase or any change, is imparted to the ever-growing and perishing beauties of all other things. He who under the influence of true love rising upward from these begins to see that beauty is not far from the end. And the true order of going or being led by another to the things of love, is to use the beauties of earth as steps

along which he mounts upwards for the sake of that other beauty, going from one to two, and from two to all fair forms, and from fair forms to fair practices, and from fair practices to fair notions, until from fair notions he arrives at the notion of absolute beauty, and at last knows what the essence of beauty is.¹

With such a lofty conception before us we might well be content to abandon our consideration of the philosophical problem. But there remains a third view, namely pragmatism, which is of great importance in educational practice, and which, in somewhat disturbing fashion, questions the validity of some of the positions we have sought to establish. We have thought of philosophy as a study of the nature of reality, as a search for ultimate values; we have seen that philosophers tend to take a monistic standpoint, assuming that philosophy is "the quest or vision of the world's unity";² and we have stood on the position that education is the dynamic side of philosophy, since it seeks to realize the values defined by philosophy by selecting experiences through which the individual will pass. Our objective has been to find the aims of education in relation to what is presumed to be real and eternal, to universals in short.

But pragmatism, the typical American philosophy of life and of education, deprecates such a standpoint. This American contribution to the philosophical problem is, as Kandel³ points out, a reflex of the practical American mind and the history of the American nation. In creating their new civilization the pioneers were continually confronted by fresh problems for which they had no ready-made solutions; their work in extend-

¹ *Symposium*, 211.

² James: *Pragmatism*, p. 129.

³ *Year Book of Education*, 1936, p. 340 *et seq.*

ing frontiers, for example, involved less the application of well-worn ideas than the forging of fresh ones to meet novel situations. The result has been that their philosophy is a theory of their way of life rather than their way of life being the working out of a theory. Further, their way of life has been predominantly experimental; thus they are inclined to stress the change and flux of the world and the experimental nature of life. Pragmatists deny any doctrine of fixed, eternal values; they revolt against absolutism and extol relativism. Philosophy, they say, must concern itself less with metaphysics and more with life, more with things of human interest. Pragmatism is essentially a humanistic philosophy, maintaining that man creates his own values in the course of activity, that reality "is still in the making, and awaits part of its complexion from the future,"¹ that "to an unascertainable extent our truths are man-made products."²

The first main proposition of pragmatism is that a true judgment is one which gives satisfactory results in experience, and that its truth is tested by the way in which it works out. Satisfactory working and utility are held to be the criteria of the true and the good. Thus the theories which we have been discussing—materialism, naturalism, and idealism—are true if they work well in life, false if they do not. The second proposition is that truth is something which happens to a judgment. In its satisfactory working a judgment becomes true; it was neither true nor false before it was tested in experience. Thirdly, we have the dangerous proposition that if a belief works we have a moral right to hold it.

Pragmatism has been fortunate in its advocates,

¹ James: *Pragmatism*, p. 257.

² *Ibid.*, p. 242.

notably William James, who in his *Pragmatism*, a transcript of eight lectures, uses all his brilliant powers of argument, persuasion, and illustration to give a masterly defence of the propositions outlined above. His subtitle is "a new name for old ways of thinking." It is true that an ancient philosopher, Heraclitus of Ephesus, who lived about 500 B.C., called attention to the unceasing process of change or flux in which all things are involved. "You cannot step twice," he said, "into the same river; for the water into which you first stepped will by now have flowed on, and other water taken its place."¹ How then is knowledge possible if nothing stays as it is? The followers of Heraclitus seem to have been even more thorough-going than their master, for they said that he could not step even once into a definite river. Heraclitus might have been glad to take refuge in some sort of pragmatism. Certainly the sophists, "the first body of professional educators in Europe,"² so far as they are entitled to philosophical rank, may be looked upon as early pragmatists. Applying "the results and methods of the natural philosophers to human conduct,"² they did not concern themselves with any search for ultimate truth, but rather concentrated on the expedient, teaching their pupils the arts that would stand them in good stead in the public life of Athens. As we saw, they incurred the wrath of Socrates who needed standards beyond those of expediency. But pragmatism as a clearly formulated answer to the philosophical question is a modern doctrine. Let us hear James speak for himself:

Grant an idea or belief to be true, what concrete difference will its being true make in anyone's actual life?

¹ C. C. J. Webb: *History of Philosophy*, p. 16.

² Dewey: *Democracy and Education*, p. 385.

How will the truth be realized? What experiences will be different from those which would obtain if the belief were false? What, in short, is the truth's cash value in experiential terms?¹

True ideas are those that we can assimilate, validate, corroborate, and verify. False ideas are those that we can not.²

Truth *happens* to an idea. It *becomes* true, is *made* true by events. Its verity is in fact an event, a process: the process namely of its verifying itself, its veri-*fication*. Its validity is the process of its valid-*ation*.²

Truth for us is simply a collective name for verification processes, just as health, wealth, strength, etc., are names for other processes connected with life, and also pursued because it pays to pursue them. Truth is *made* just as health, wealth, and strength are made, in the course of experience.³

'The true,' to put it very briefly, is only the expedient in the way of our thinking, just as 'the right' is only the expedient in the way of our behaving. Expedient in almost any fashion; and expedient in the long run; for what meets expediently all the experience in sight won't necessarily meet all further experiences equally satisfactorily.⁴

Almost equally famous as an exponent of pragmatism, particularly in educational matters, is Professor John Dewey. He maintains that philosophy must be described in terms of the problems with which it deals, that indeed it has meaning and significance only in connexion with the solution of problems.

These problems originate in the conflicts and difficulties of social life. The problems are such things as the relations of mind and matter; body and soul; humanity

¹ *Pragmatism*, p. 200.

² *Ibid.*, p. 218.

³ *Ibid.*, p. 201.

⁴ *Ibid.*, p. 222.

and physical nature; the individual and the social; theory—or knowing, and practice—or doing.¹

Thus he accepts the traditional subject-matter of philosophy but insists on the practical application of answers to philosophical questions.

Whenever philosophy has been taken seriously, it has always been assumed that it signified achieving a wisdom which would influence the conduct of life. Witness the fact that almost all ancient schools of philosophy were also organized ways of living, those who accepted their tenets being committed to certain distinctive modes of conduct; witness the intimate connexion of philosophy with the theology of the Roman church in the middle ages, its frequent association with religious interests, and, at national crises, its association with political struggles.²

So philosophy is thinking what to do in a life situation, and it is brought into existence when problems occur. Regarding it thus, rather than as a passive contemplation of or inquiry into the nature of reality, pragmatism seeks to bring it down from the heavens and consciously and deliberately to apply it to life. The pragmatists react against excessive intellectualism and call attention to the creative powers and functional activities of the human mind.

In this they find support from modern psychology. It is a commonplace to remark that psychology is now a positive study and that it has got away from metaphysics. Instead of asking and failing to answer difficult questions about the nature of mind it concerns itself with behaviour. Thorndike's psychology, indeed, had a direct effect on American pragmatism. He taught that what we call mental processes are forms of adjustment to stimuli, that the individual grows and develops by

¹ *Democracy and Education*, p. 378.

² *Ibid.*, pp. 378, 379.

responding to stimuli and by dealing effectively with situations, his development therefore being occasioned by the commerce which he holds with his environment. Responses are encouraged or discouraged in proportion to the success or failure that attends them; successful responses become habitual, for "nothing succeeds like success." Thinking takes place only when new problems emerge, and there is no thinking when there is no problem; when things are going easily responses are more or less automatic. Valid thinking is the thinking which finds a satisfactory solution to a problem, and in this sense animals, Köhler's chimpanzees, for example, can certainly be said to think.¹ Such a psychological doctrine thus takes a biological view and regards human and animal mentality as continuous. Now the notion that ideas are instruments of adaptation, and that the power of abstract thought has been forged in the course of evolution as a means of dealing effectively with life situations, is well in line with pragmatism. It is, however, an inadequate basis of pragmatism if it implies that the environment is static. An essential feature of pragmatism is its emphasis on man's power to adapt his environment to his own needs, to create, by the successful solution of problems, a fairer and better environment for himself.

To decline to be convinced by pragmatism is certainly not to deny the value of much of its teaching both in life and in education. Let us briefly examine its main propositions.

Satisfactory working in experience as a test of truth may be accepted, provided that the satisfactory working referred to means something more than merely agreeable consequences, and that the experience is not the

¹ See *The Mentality of Apes*.

experience of one individual only. Unless this proviso is made we should have things true for one individual and not for another. But although James does ask, "May there not after all be a possible ambiguity in truth?"¹ his question does not necessarily imply that he himself takes the pluralistic view of truth which most of us would find unacceptable; he safeguards himself by insisting that satisfactory working in experience must be satisfactory working in all possible circumstances, that experience must be experience in the long run, that the truth must be verifiable on all occasions as well as verified on one, that the working must be intellectually as well as practically satisfactory. Even if we believe that truth is correspondence with a supposed reality we do as a matter of fact use this criterion to test whether our judgments possess such a correspondence, believing that if they lack it we are bound at length to detect the error in the course of experience. But we say that it is because they are true that the judgments work. Now the test of satisfactory working has always provided a valuable check on unbridled speculation and it ought to remain so: indeed there is no other way of testing theories. Some might even concede agreement with James when he says, "You can say either 'it is useful because it is true' or 'it is true because it is useful.' Both these phrases mean the same thing, namely that here is an idea that gets fulfilled and can be verified."

But the notion that an idea "becomes true, is made true by events" is in direct conflict with the idealist conception that there is an objective reality to be known, and that "truth is fidelity to objective reality."²

¹ *Pragmatism*, p. 194.

² Patrick: *The World and its Meaning*, p. 389.

Idealists maintain that their present judgments are true if they correspond to reality and false if they do not, and that their truth or falsity is there before they have been verified. The planet Neptune did not begin to exist when it swam into the ken of the astronomers, or even earlier, when Adams and Le Verrier discovered it by mathematical calculation; surely the judgment "there is a planet outside the orbit of Uranus" was true when the two famous mathematical physicists began their work, taking that judgment as a working hypothesis. Was it true before they, or anyone else, thought of making it? No doubt pragmatists would reply that the judgment did not exist before it was made, and therefore it could be neither true nor false. But idealists would argue that, although the judgment was not made, it might have been made, and that the object of the judgment existed, or did not exist, independently of the actual judgment or its verification. Here the two schools of thought must diverge.

Further, to say that if a belief works we have a moral right to hold it seems a most unsatisfactory surrender of reason to comfort and convenience. It seems only common sense to reply that what is verified by the working of such and such a belief is that the holding of that belief produces a satisfactory result, and that its truth still remains an open question. In any case, on pragmatic principles, the loss of intellectual integrity involved in such a position would seem to many to be an unsatisfactory consequence.

Since pragmatists deny the existence of values in advance there can for them be no clear vision of a goal. But when American pragmatists talk, as they do, of education as the force which creates a finer and better civilization, one is entitled to ask by what criteria they

measure the success of their efforts; for it would seem to the ordinary person that some sort of standard is implied. Here pragmatists will reiterate that what constitutes a loftier civilization cannot be known in advance: all that can be said is that it will work well, that in that dawn it will be bliss to be alive and very heaven to be young. But surely values and standards, however vaguely realized, are needed to direct effort, and must exist beforehand. There is really an implied acceptance of a scheme of values among educational pragmatists; as Kandel says, "There is a nostalgia for values towards which the world is to move."¹

It is perhaps unduly severe to call pragmatism "a grotesque confusion of means and ends,"² for William James's thinking was certainly free from confusion. But it seems fair to regard it as a method of clear thinking, a way of approach to philosophical problems, rather than itself a philosophy. Originally the application of the positive, experimental method of science to problems outside science, it was raised to philosophical rank by James. If, however, philosophy is a critical and disinterested investigation of things as they are, then pragmatism, which concerns itself with how things work, is not, strictly speaking, a philosophy. Since it denies the importance and relevance to life of some of the deepest questions man's mind can ask, since it discards the very notion of ultimate truth, it clearly can have nothing to say on the nature of reality. Indeed it is just because it regards as futile the quest for an answer to fundamental questions that professional philosophers have not taken kindly to it.

Pragmatism is essentially a mediating attitude of

¹ *Year Book of Education*, 1936, p. 356.

² Windelband, quoted by Patrick: *The World and its Meaning*, p. 397.

mind; James offers it equally to the 'tender-minded' thinkers who incline to idealism and the 'tough-minded' who favour naturalism. It is often described as a *via media* between idealism and naturalism, but on the whole it seems to incline more to the former. In its notion that values are man-created, that they do emerge as successful action and experimentation take place, it is within measurable distance of what is sometimes called a dynamic idealism, in contrast to the static idealism of Plato. It can be criticized only by a thorough-going idealism; if idealism in the Platonic sense is true, then pragmatism must be incomplete; if eternal values exist in the nature of things then they are not created by man but are there to be found.

The reader has a right to know at this point in which direction, if sympathetic, he is being led; and which doctrine, if he is critical, he will have to confute. It has probably already been made evident that the writer is 'tender-minded,' and here he nails his colours to the mast of idealism. He regards naturalism as an incomplete and therefore unsatisfactory theory of the nature of man, although he admits that it has much to contribute to education. And in spite of all the plausibilities of pragmatism he thinks it wrong to shrink from the most searching inquiry of which man's mind is capable, although again as an educationist he is willing to learn much from that doctrine. In short, he regards idealism as fundamental, naturalism and pragmatism as merely contributory, in the theory and practice of education. And, if he were a pragmatist, in these dark days when there is a "nostalgia for values" he might even defend his choice of idealism on pragmatic grounds as the only philosophy which provides a way of escape from chaos.

REFERENCES FOR FURTHER READING

- CUNNINGHAM: *Problems of Philosophy*.
DEWEY: *Democracy and Education*, Chapter XXIV.
DRAKE: *Invitation to Philosophy*.
EDDINGTON: *Space, Time, and Gravitation*.
HÖFFDING: *Outlines of Psychology*, Chapter II.
JAMES: *Pragmatism*.
JEANS: *The Mysterious Universe: Eos, or the Wider Aspects of Cosmogony*.
JOAD: *Return to Philosophy: Review of Philosophies*.
PATRICK: *The World and its Meaning*.
RUSK: *The Philosophical Bases of Education*, Chapter II.
RUSSELL: *Problems of Philosophy*.
SHAW: *Back to Methuselah*, Preface.
WEBB: *History of Philosophy*.

CHAPTER IV

NATURALISM IN EDUCATION

IN our first two chapters we argued and illustrated the proposition that theories and systems of education are reflexes of modes of philosophical thought. In this and the two succeeding chapters we shall seek to demonstrate this truth still further by reference to the three philosophical doctrines discussed in the preceding chapter, namely naturalism, idealism, and pragmatism. But, since these are broad modes of thinking rather than sets of clear-cut propositions, we must expect the correspondence between them and educational doctrines to be of a general rather than of a specific character. We must also understand clearly that no one has ever sat down to work out an educational system by rigorous deduction from a philosophical theory as major premise. It is only in a wide, general sense that we find similar trends of thought in philosophy and education. Most educational systems draw their sustenance from more than one school of philosophical thought: like the ordinary man in his philosophy they are, to a greater or less degree, eclectic. Rousseau, who is characterized by Adams as "perhaps the most prominent naturalist who ever wrote on education,"¹ is seen by Rusk to be an idealist who opposed nature "not to spirit but to social convention,"² and whose naturalistic stage of education was merely preparatory to moral, aesthetic, and religious training. It is probably

¹ *Educational Theories*, p. 37. ² *The Philosophical Bases of Education*, p. 35.

correct to say that while many of Rousseau's methods, especially in the earlier stages of education, were decidedly naturalistic, his aims were idealistic. Thus, we must not expect to be able neatly to label educational theories as idealistic, naturalistic, pragmatic, or realistic, for they themselves are not tidy and clear-cut to that extent. But, bearing this caution in mind, we shall see that there are trends of education which do, on the whole, call for one label rather than another.

✓ In considering the contribution of naturalism we shall do well to begin by recalling the main aspects of the philosophy which bears this name. There is, first of all, the naturalism of physical science, which, concentrating its gaze on external nature, has difficulty in giving any reasonable account of man himself. This form of naturalism, since it takes a view of the universe that relegates man to the background, has little to contribute to education, which by its very nature is an intensely human activity. The second form of naturalism, namely mechanicalism, which regards man as a machine, is not entirely negligible in educational theory and practice, for, as we have seen, it has given us the behaviourist psychology. But it too is unimportant in comparison with the third form of naturalism which, since it is founded on the notion of evolution, we have called biological naturalism. Regarding animal and human development as continuous, seeking the explanation of man in terms of his racial past, it gives us the doctrine of the 'natural man'; it stresses the nature man inherits from pre-human ancestors and discounts his spiritual nature. Man's body, or at least that nature he has in common with the animals, is held to be the real man. Natural impulses are therefore of great importance and are regarded as good in themselves.

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sophism: - false argument meant to deceive

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Nature, in the sense of man's instincts, primitive emotions, and unsophisticated judgments is held to be a more trustworthy and reliable guide to conduct than reflection, or the capitalized results of experience. Thus Rousseau, for example, maintains that "the only habit the child should be allowed to contract is that of having no habits."¹

Naturalism, as Adams points out,² is a term loosely applied in educational theory to systems of training that are not dependent on schools and books but on the manipulation of the actual life of the educand. It reacts against study and aims at creating conditions in which natural development will take place. It always comes on the scene as a protest against well-established systems that have become stereotyped; always it pleads for greater simplicity, always it seeks to banish sophistication by sweeping away paraphernalia. Its watchword is 'Back to Nature,' and its fighting adjective is 'artificial.' Thus when an educational movement has exhausted its mandate, when it has lost its original impetus and spent itself, retaining only the letter and not the spirit of its original form, it is normally succeeded by a wave of naturalism.

(For a further) Historically, naturalism was a reaction against the pedantry into which the humanism of the Renaissance had degenerated. That fine movement was itself a reaction against the arid, hair-splitting logic of medieval scholasticism; beginning as the study of man himself through the medium of the literature that embodied the spacious lives of ancient Greece and Rome, it became in its decay a mere study of books and of linguistic forms. As always in such circumstances it

¹ *Emile, or Education* (Everyman Edition), p. 30.

² *Evolution of Educational Theory*, p. 251.

was inevitably followed by a naturalistic movement. For similar reasons we had a naturalistic movement in education after the Great War of 1914-18. The ideals that had inspired the educational reformers of the nineteenth century to establish universal education had spent themselves; schools had got into the rut of a barren, stereotyped procedure; the results of half a century of popular education were rightly regarded as disappointing in proportion to the effort made; we were, after all, only a 'C3' nation. School curricula were seen to be at fault, and a radical change of aim and method on more natural lines was called for.

Rousseau himself was an example of this characteristic attitude of protest; perhaps it is for this reason that, although his aims were idealistic, he is claimed as a prophet by all educational naturalists. Born at Geneva in 1712, he seems to have been a curious character throughout life. He was decidedly 'contrary' in his attitude towards established institutions, and his position of emphatic protest, expounded in his famous educational treatise *Emile, or Education*, is crystallized in the dictum: "Reverse the usual practice and you will almost always do right."¹ "Human institutions," he said, "are one mass of folly and contradiction."² "Men are devoured by our towns."³ *Emile* was, therefore, to be taken away from his parents, away from society and its schools, and educated in contact with nature, 'according to nature,' by an ideal tutor. For "God makes all things good: man meddles with them and they become evil";⁴ therefore "you must make your choice between the man and the citizen, you cannot train both."⁵

¹ *Emile, or Education* (Everyman Edition), p. 58.

² *Ibid.*, p. 26.

⁴ *Ibid.*, p. 5.

² *Ibid.*, p. 46.

³ *Ibid.*, p. 7.

His sincerity has often been doubted, and opinions as to his true greatness have differed enormously. Voltaire maintained that the man was factitious from head to foot, while Napoleon declared that without him the French Revolution would not have taken place. Certainly he has irritated many people, but, like Socrates, he has been a gadfly stinging his contemporaries and his successors into thought. If we are to judge by results we must admit his greatness. *Emile* has had a unique and lasting influence; in its power of stimulating and directing educational thought it is comparable only with Plato's *Republic*, which its author extols as "the finest treatise on education ever written."¹ It has justly been called one of the most seminal books in the whole literature of education, perhaps in all literature. Rousseau "was the forerunner of many who, all unconscious of their indebtedness, . . . have followed in the trails he blazed through the forest, until now they have become the broad highway of common travel."² Certain it is that the educational ferment he started has not died down even yet. Perhaps the difficulty we have encountered in labelling him as naturalist or idealist constitutes a measure of the wealth of ideas to be found in his writings.

✓ If the educational aims of Rousseau, the great naturalist, were, after all, idealistic, are there any educational aims specifically associated with the philosophy of naturalism? From the mechanistic view of man and the concomitant behaviourist psychology we can get no higher aim than to make the human machine as good a machine as possible by attending to its construction, by elaborating it and making it capable of more and

¹ *Emile; or Education* (Everyman Edition), p. 8.

² Monroe : *Text-book in the History of Education*, p. 572.

more complicated tasks. In behaviourist terms, the main aim must be to establish the conditioned reflexes that are the habits of action and thought appropriate to modern life. From the extolling of the natural man and the assertion that natural impulses are in themselves good because they yield pleasure, we get the aim of education as present and future happiness. The pleasure or happiness that is thought of here is not necessarily immediate pleasure, but pleasure that is lasting and permanent, more worth while in the long run. There is, therefore, a place for self-restraint in education; prudence and the ability to evaluate pleasures rank high among the virtues. By fostering these virtues education secures future as well as present happiness.

But McDougall, the famous exponent of a naturalistic school of psychology, denies the truth of the hedonistic view that all our actions are motivated by the pursuit of pleasure and the avoidance of pain. Our motives of conduct are rather, in the last resort, our propensities to attain certain natural goals; pleasure and displeasure are by-products of our activity which come on the scene according as we are or are not reaching out successfully towards these goals. From such a standpoint the aim of education is the sublimation of the energies of the propensities; the re-direction, co-ordination, and harmonious working of the native impulses. Education should enable the individual to attain the goals set him by nature in ways that have individual and social value. But a mere naturalism has little to say as to what the criterion of value may be.

Educational aims derived from the naturalism that is founded on the notion of man's evolution from lower

forms of life differ according to the explanation of the fact of evolution that is accepted. If the neo-Darwinian view, which emphasizes the selective action of the environment on the living creature along with the struggle for existence and the consequent survival of the fittest, be correct, then clearly the aim of education must be to equip the individual, or the nation, for that struggle and so to ensure survival. If, on the other hand, the neo-Lamarckians are correct in maintaining that evolution to higher forms of life has as its basis the power of the living creature to adapt itself, its habits, and its bodily structure to the circumstances in which it finds itself, a different conclusion is reached. Education is seen as the process of adjustment to environment; it aims at enabling the individual to be in harmony with and well adapted to his surroundings. Health, both of mind and body, is stressed, and the ideal is a well-adjusted, happy being, with no discontent, divine or otherwise.

But some naturalists, notably Bernard Shaw, go further than this. They see education as man's deliberate effort to accelerate the pace of evolution itself, to achieve racial improvement more quickly than would otherwise be the case. Here they are up against the difficulty of the non-transmission of acquired characteristics. While it is true that this question obstinately refuses to be finally settled, the negative verdict of science up to date, that the characteristics acquired in one generation are not transmitted to the next through the germ-cell, cannot be ignored. It would greatly strengthen the position of the Lamarckians if a clear case of transmission could be proved. But what is not achieved through bodily heredity may be achieved through social heredity: the younger generation can

and does re-acquire the gains of its elders by growing up in an 'imitation area'¹ of which these gains are prominent features. Education, then, is the preservation, the handing on, and the enhancement of these racial gains, generation by generation.

Paragraph - We now seek to discuss some broad features of natural-
Features of nature - istic education, and we may begin by noting its constant emphasis on the nature of the child. Education is to be firmly based on that nature, which is believed to be good. Naturalists usually tend to accept the Wordsworthian view of the child as a being who comes from heaven "trailing clouds of glory,"² rather than the standpoint of Jeremiah that "the heart is deceitful above all things, and desperately wicked."³ They are interested in the child as he is, rather than as he will be when education has done its work; they regard exalted adult standards of conduct as unimportant in comparison with child behaviour even in its most reprehensible forms. They look on education not so much as preparation for living as living itself; they conceive of childhood as something desirable for its own sake and expect children to be children, declaring with Rousseau that "Nature would have them children before they are men,"⁴ and echoing his famous question: "What is to be thought, therefore, of that cruel education which sacrifices the present to an uncertain future, that burdens a child with all sorts of restrictions and begins by making him miserable, in order to prepare him for some far-off happiness which he may never enjoy?"⁵ Monroe says that it was Rousseau who first proclaimed the view that "education finds its purpose, its process,

¹ Adams: *Evolution of Educational Theory*, p. 112.

² *Ode on the Intimations of Immortality*.

⁴ *Emile, or Education* (Everyman Edition), p. 54.

³ *Jeremiah*, XVII, 9.

⁵ *Ibid.*, p. 42.

and its means wholly within the child life and the child experience." ¹ The word 'wholly' makes most of us pause to wonder whether the statement is not too emphatic. The same writer's summing up of Rousseau's conception of education as "the process of development into an enjoyable, rational, harmoniously balanced, useful, and hence natural life" ² is fairer and more generally acceptable. For the child's nature is not static; it grows and develops.

So the emphasis on the nature of the child becomes, on consideration, an emphasis on his natural development. But what lines of development are natural, what unnatural? To find an answer to this question the modern naturalist turns to psychology. For a long time now educators have been enjoined to study psychology in order to learn of the nature of the child, but it is only in comparatively recent times that such a quest has been fruitful. The introspective studies of intellectual, adult philosophers could shed no light on the nature of the child mind, even when boiled down and reduced in scale, for the child is not so much a little man as a man in the making. Gradually it was realized that a psychology of development was essential for education. Some saw the development of the child writ large in the development of the race and sought to plan education in accordance with such a theory; others took the more helpful biological standpoint and formulated the instinct psychology. But the present-day movement to study infants, children, and adolescents directly and objectively has yielded better results.

The thorough-going naturalist, however, is not so much concerned to plan education in accordance with

¹ *Text-book in the History of Education*, pp. 571, 572.

² *Ibid.*, p. 570.

any psychological doctrine, however accurate, as to allow child-nature simply to unfold itself. Education is merely the fostering of natural development, and true education takes place when the nature, powers, and inclinations of the child are allowed to develop freely with a minimum of guidance. Holding the belief of Comenius that "nature observes a suitable time," the naturalistic educator allows the child to follow the lines of his natural interests and to have free choice of activities, with no interference or thwarting. Anything that impedes this free choice stands condemned. Schools themselves are sometimes looked at askance, contrasts being drawn between the natural learning of the child in a good home and the artificial training provided by the schools. In other quarters, no doubt, it is the home and the parents that are condemned as the worst enemies of natural development, schools being considered necessary as places where children can be free from pernicious influences. Such schools seek to provide the ideal environment of freedom for the development of the growing child. There is an abhorrence of unnatural class-methods which assume that all children go at one pace and learn by one method, and there is an equal abhorrence of time-tables which dictate what a child should be doing at a given time. Here again we have the characteristic attack of naturalism on established institutions.

Teaching.

The educator himself, of course, has to be very careful not to come under sentence of banishment; indeed, in some systems he is barely tolerated. Certainly any interference on his part is deprecated; not only is he forbidden to resort to any coercive or didactic methods, but he may not even seek to influence. His place, if any, is behind the scenes; he is an observer of the child's

development rather than a giver of information, ideas, ideals, and will-power, or a moulder of character. These the child will forge for himself; he knows better than any educator what he should learn, when and how he should learn it, what he should do and how he should do it. His education is the free development of his interests and motives rather than an artificial effort made on him by an educator. Yet one has still to hear of systems where there is no educator at all. Generally he is allowed to be necessary, not merely as an observer, but as a setter of the stage, a supplier of materials and opportunities, a provider of an ideal environment, a creator of conditions under which natural development takes place. Thus Montessori surrounds the child with apparatus designed to foster the powers of the child and tempt him to teach himself. From the child's point of view the system is one of auto-education. Norman MacMunn¹ went further and encouraged the natural propensity of young people to instruct one another.

Much of this modern naturalistic movement finds its root in the pages of Rousseau. Although modern psychologists would not wholly agree with him that "the most dangerous period in human life lies between birth and the age of twelve,"² the school of educational thought which we have been describing concurs with his view that education from five to twelve should be largely negative rather than a positive effort by the educator, who was advised to leave the child largely to himself and learn how to lose time wisely. In a letter to A. Christophe de Beaumont, Archbishop of Paris, Rousseau said:

¹ *The Child's Path to Freedom.*

² *Emile, or Education* (Everyman Edition), p. 37.

I call a positive education one that tends to form the mind prematurely, and to instruct the child in the duties that belong to a man. I call a negative education one that tends to perfect the organs that are the instruments of knowledge before giving this knowledge directly ; and that endeavours to prepare the way for reason by the proper exercise of the senses. A negative education does not mean a time of idleness ; far from it. It does not give virtue, it protects from vice ; it does not inculcate truth, it protects from error. It disposes the child to take the path that will lead him to truth, when he has reached the age to understand it ; and to goodness, when he has acquired the faculty of recognizing and loving it.

Nothing during this period was to be done to mould or force the child's mind. He was not, for example, to be taught to read, though he would probably acquire the art for himself. His body, organs, senses, and powers were to be exercised, but his soul was to lie fallow. No moral training beyond the discipline of natural consequences was to take place.

We may sum up the naturalistic conception of education by saying that it is the child himself rather than the educator, the school, the book, or the subject of study that is in the foreground of the educational picture. Sir John Adams, borrowing a neologism from Dr Stanley Hall, has called this the paidocentric attitude. His balanced judgment and common sense, his knack of getting to essentials, and his power of evaluation, enabled him to survey the whole educational field of the first quarter of this century and to assess the value of the various aspects of the 'new' teaching and the 'new' education. In *The New Teaching*¹ he compiled accounts of methods furnished by various well-known subject-

¹ 1928.

specialists, while he himself in an introductory chapter extracted the common factor of all, finding it to be paidocentricism. In *Educational Movements and Methods*,¹ he collated articles written originally for *The Journal of Education* on educational topics ranging from Eurythmics to Reform Methods of Latin Teaching and again found common ground in the constant focussing of attention on the child himself. Perhaps the most valuable of this series of his works is *Modern Developments in Educational Practice*,² in which he himself wrote critical accounts of various aspects of modern education, again showing in his introductory chapter that, in all the complexities and elaborations of modern educational experiment, it is the child who has entered into his kingdom. Paidocentricism, then, may be said to be the keynote of the modern movement, and it is essentially naturalistic.

Another way of summing up the naturalistic conception of education is to say that it is based on psychology. It was Rousseau again who imparted momentum to the psychological movement in education. In declaring so emphatically that education must accord with child nature, he made it clear that that nature must be known; and in definitely setting this important problem he was one of the forerunners of the modern psychological movement. It is true that before his day we have Thomas Fuller describing the good schoolmaster as one who "studieth his Scholars' natures as carefully as they their books";³ but it was the impassioned pleading of the French philosopher that made it impossible any longer to neglect child nature. In different ways his successors, Pestalozzi, Herbart, and Froebel, strove to make his vision concrete, and the psychological move-

¹ 1924.² 1922.³ *Holy and Profane State*.

ment since their day has proceeded by leaps and bounds. It has by no means spent itself yet, for to-day we are still trying to discover the true nature of the child and to work out the implications of Rousseau's position that that nature is the chief datum in the educative process.

Thus the psychological movement, which is the core of educational naturalism, has a fairly long history, and nowadays its ramifications are endless. As we have already noted, the desire to know child nature has led to a direct study of the child himself, the result being an ever-increasing stock of knowledge of which the educator may avail himself. This knowledge is to be found in the wealth of books on educational psychology; here we may mention only a few aspects of it. The psychology of McDougall with its emphasis on native interests and motives of behaviour, with its account of how these are organized into sentiments or large-scale motives, how these in turn are integrated into a self-regarding sentiment, character, and will, has proved an eminently workable theory for educators who study their craft and seek to improve their technique of inducing the child to learn and of fostering the growth of character. The direct studies of learning by Thorndike and others are successfully applied to the teaching of manual and mental skills. Progress has been made with the study of the modes of thinking and reasoning employed by the child, and of the imagery used by him, and this has had an important effect on methods of teaching young children. Studies of development have revealed the fact that the child is a very different being at successive stages of his growth; the result of these has been not merely the arrangement of subjects of study in accordance with the child's developing interests, or the observation of suitable stages in the teaching of

any one subject, but also the re-organization of our national system of education to suit the needs of early childhood, late childhood, and adolescence respectively. Work on intelligence has convinced us all that differences in intellectual capacity are too great to be ignored, that it is idle to expect all children to be equal in this respect, or to require them all to perform tasks of the same degree of difficulty. Now an attack is being launched on the elusive question of temperamental and emotional types, the results of which are being eagerly awaited by many educationists. ✓

Psychoanalysis, or the psychology of the unconscious, has a specially close connexion with the educational naturalism of to-day. Psychologists of this school see the neuroses and the consequent ineffectiveness that afflict individuals and societies as the result of unnatural, repressive influences that have operated in early life, especially with regard to sex-matters. The teaching of Freud was a godsend to the post-war apostles of naturalism, both in the educational sphere and outside of it; it was believed to have proved the soundness of their case for untrammelled self-expression and for entire freedom from restraint. Books on psychoanalysis applied to education flooded the market and found many eager readers. Educational systems informed by psychoanalysis aim at free, natural development through the prevention of repression and its resulting state of unconscious conflict and neurosis. Although there have been many extravagances and one-sided views, this educational movement has been on the whole a healthy one. It has fostered a sane attitude towards sex and towards authority; it has warned educators against the dangers of undue prudery, authoritarian methods, corporal punishment, in short,

against any bottling up of the child's energies. Perhaps most valuable of all has been its contribution towards the understanding and treatment of delinquency in childhood and adolescence and, even more, its determined effort to avoid the causes of such delinquency.

As regards the actual methods of naturalistic education we may note first of all the stress that is laid on direct experience of things. Naturalists take seriously Rousseau's dictum: "Give your scholar no verbal lessons: he should be taught by experience alone."¹ The philosophy of realism supports this naturalistic trend towards activities with real things rather than verbal studies.² The slogan "Things rather than words" needs careful examination, but it has the merit of warning teachers against their inveterate tendency towards verbalism, and of reminding them that it is necessary to ensure that their pupils' vocabularies have a sound basis of actual experience. Thus, for example, science should not be taught from readers, or by 'chalk and talk' lessons; it should rather be learned by the pupil through his own work in the laboratory or, wherever possible, through a direct study of natural phenomena outside the school altogether. Geometry should not so much be taught by arguments and problems in textbooks, however lucidly explained, as learned in its original sense of 'earth-measurement' by means of surveying the playground or school field, finding the height of the school, finding the breadth of a river, and other practical exercises in mensuration. The methods of the Scout movement are commended, and the phrase 'boy-scout geometry' has been coined. Geography should be learned in school-journeys and actual excursions, rather than taught from books and

¹ *Emile, or Education* (Everyman Edition), p. 56.

² See p. 212.

maps. In short, the naturalist educator rightly thinks less of his own exposition, much more of the learning-experience of the pupil.

We may also note the stress laid on the value of direct experience of social life. The rights and duties of citizens are learned not through talk, but through the organization of the school as a free, natural society, where the contribution of each is welcomed, where each learns to be leader in something and one of the led in others. The old authoritarian methods are abolished and self-government is the order of the day. Officers are freely elected and, as for the teacher,

His part is not to be a *roi fainéant*, but rather to be in his little republic a perpetual president, who must exercise the duties of citizenship all the more scrupulously and assiduously by reason of the exceptional powers his position gives him.¹

In order that the school society may be as real as possible, naturalists usually advocate co-education, contending that it is unnatural to separate the sexes, and that such separation results in unnatural attitudes of the sexes towards one another. This is a vexed question on which emphatic opinions are apt to be expressed, ranging from the typically French view of Demolins² that co-education "*en France, n'a cessé, depuis le moyen âge, de nous sembler horriblement dangereuse et immorale*" to those of American and Scottish educationists who take the system for granted. In England there have been some notable experiments in co-educational boarding-schools, and these are well in line with the naturalist movement. For if it be argued that it is unnatural to remove children from their

¹ Nunn: *Education: its Data and First Principles*, p. 112.

² Quoted by Adams: *Evolution of Educational Theory*, p. 281.

parents, the reply is that good boarding-schools make it their business to secure better conditions than the home for the natural development of children, and that their ideal is family and community life at their best.

One cannot leave the question of naturalistic methods of education without a reference to the play-way, the principle underlying which is that all learning is to take place in the spirit and by the method of play. Psychological studies of play have resulted in the conclusion that it is in his free play that the child most clearly reveals his nature and the lines of his natural development. Whether play is seen as the recapitulation of the activities of primitive man, or as a rehearsal of future adult activities, or as a means of discharging the energy of native propensities, all are agreed that it is nature's mode of education. Not only is this true of the play of childhood. Play is very far from being an activity that is merely frivolous and wasteful of time in later life; it is rather in the true spirit of play that man does all his creative work. So the play-way in its manifold forms is the outstanding general method of creative education, and it is essentially naturalistic. It has been worked out fully in infant schools, not only in those which bear the honoured name of Montessori: it is strikingly exemplified in the boy-scout movement, in school-journeys, and in all schemes of self-government. Indeed the formula includes all methods of learning which foster the spirit of joyous, spontaneous, creative activity, and its applications are endless.

The modern naturalistic movement in educational theory and practice has been expounded in clear and uncompromising fashion by A. S. Neill in a series of books ranging from *A Dominie's Log*¹ to *That Dreadful School*.²

¹ 1915.

² 1937.

His attitude of protest against existing methods of education was expressed in the former, which he now tells us was a groping book; he felt that schooling was all wrong, but did not know how to put it right. In the latter he gives an account of how he has put it right at Summerhill, the 'dreadful' school referred to in his disarming title. It seems worth while to attempt a summary of this book, in order that the characteristic features of naturalism in practice may be made clear.

Believing that the aim of life is happiness, Neill has sought to make Summerhill the happiest school in the world. It is a residential school, because, while the home is primarily adapted for adults, the boarding-school is made for children. The aim is to make the school fit the child rather than to make the child fit the school. Freedom is necessary, for only under freedom can the child grow in his natural way; thus, renouncing all discipline, all direction, all suggestion, all moral training, all religious instruction, Neill allows children freedom to be themselves. He claims that the merits of Summerhill are those of healthy, free children whose lives are unspoiled by fear and hate; and that his school has gone further than any other school in freedom, with the possible exception of Dora Russell's school.

He professes a complete belief in the child as a good, not an evil being; being born good, he remains good when all opportunity to fear and hate is abolished. Like all naturalists he regards the play of children as of paramount importance. Childhood is playhood, and the play period lasts longer than is generally supposed; thus at Summerhill children play all day if they want to, their job being to create. He will not have adult standards forced on children, and he regards authority and morality as merely policemen who restrict their

activities. Children are not young adults, but a different species; it is what they are that is really important, not what adults think they should be. Their interests are immediate, and the future does not exist for them. They ought not to be taught religion, since no child wants to practise religion when he is free, and there are no signs that worship is a natural thing in children. Children's values are different from those of adults; thus no attempt is made to lead them to higher tastes, whatever 'higher' may mean. Few children like classical music or classical paintings, and, if a school tries to uplift them by providing beautiful classical paintings on the walls and beautiful furniture in the rooms, it is beginning at the wrong end. Children are primitives, and until they ask for culture they should live in as primitive an environment as can be provided.

From these postulates it follows that the educator must ever be on the side of the child; he must understand children, having the negative attitude of knowing what not to do, and the positive attitude of love and approval, for only thus can he ensure sincerity on their part. To love and approve of children he must have remained a child himself, avoiding the tragedy of growing up and forgetting childhood. He must have a sense of humour—childish humour, for children have a sense of fun rather than a sense of humour. So, abjuring all superiority, never expecting deference, the educator must be content to be regarded as an equal by equals, seeking not his own, but always giving himself. Neill declares that his own life is, and ought to be, "one long give."

He contends that his view of the original virtue of the child is borne out by his long experience. Any difficulties, such as the misuse and destruction of valu-

able tools, are due to expecting the child to possess adult standards with regard to property; or, as in the case of bullying and anti-social behaviour, to a warping of child-nature by unwise treatment in the home. Unhealthy repression of sexual interests by too moral and too religious parents is regarded as the chief cause of difficulty. In the school, Neill seeks to avoid such repressions by an attitude of perfect frankness; sex-questions are openly discussed, and there are no moral taboos. He will not regard sex as a moral problem at all, and he permits nudism. Children are allowed to swear openly, for they accept swearing as a natural language; at Summerhill nothing is regarded as unmentionable. The great stress on a healthy attitude towards sex leads naturally to an enthusiastic advocacy of co-education, for that is the only possible education. To the usual cry of danger, Neill rejoins that there is no fear of undesirable incidents when there is no repressed and therefore unnatural interest in sex; and he assures his readers that he is possibly the least anxious headmaster of a co-educational school in England. In short, there are no dark corners in Summerhill, and the children have a really clean attitude to life.

Unsatisfactory attitudes towards sex, resulting from home treatment, are dealt with in 'private lessons,' which are informal talks rather than psychoanalysis. The object of these lessons, which Neill regards as his most important work, is to deal with difficulties arising from family situations, to remove sex-taboos, to lop off all complexes given by morality and fear. He talks of them as re-education, and regards them as a sometimes necessary scavenging spring-cleaning before the summer of freedom. He keeps the talks objective

and uses no set method of analysis, believing that analysis is unnecessary when children can live out their complexes in freedom. Curing a neurosis in a child is a matter of the release of emotion; the curing agent is love, approval, freedom to be true to self. Cure comes gradually; it is only in psychological text-books that cures are sudden and dramatic. Private lessons, which are given for emotional purposes only, are welcomed, sometimes demanded by children; they are, however, given up if any resistance is shown.

Government is allowed to be necessary at Summerhill. Social freedom no one can have, for the rights of others must be respected; individual freedom every one should have. A child may not always do as he pleases, for he is hedged in on all sides by his own laws. It is only in things that affect him and him only that he is allowed to do as he wills. Government is required to regulate the school society, but it must be self-government; children must feel completely free to govern their own social life, with no direction from above. The function of the government is to make laws and to discuss social features of the community, rather than to act as a police court. Further, the laws that are made deal with essentials, not appearances.

At the beginning of each term a government of five is elected by vote. The 'big five' consist of elder pupils; to begin with, popular members of the community are normally chosen, but later on they are replaced by quiet, capable lads. One of their main functions is the guardianship of the school reputation outside the school; and they form a sort of cabinet which deals with offences, acts as a jury, and awards punishments. There is a general meeting each Saturday night, a chairman being elected on the spot; the cabinet, never

seeking adult advice, announces its verdicts at this meeting which confirms, rejects, or amends them. Subject to this proviso, the cabinet has unlimited power, even that of expulsion. Neill tells us that this extreme measure is never recommended, but he admits that he himself has expelled pupils in the name of the school. On occasion he has arranged that children should leave, taking care that a proper place was found for them beforehand; but this has been done only after a brave attempt to help the individual by psychological means has been made. Offences such as bullying and stealing have often to be tackled by the cabinet and the weekly general meeting; punishment is seldom awarded for the latter, but there is always reparation. Various minor offences are dealt with by an automatic fine rule. The children's loyalty to their own democracy is amazing. No culprit ever shows any signs of defiance or hate of the authority of his peers, and usually the government's verdict is accepted both by the culprit and the community.

Neill is emphatic that, as a means of education, self-government is of infinite value; and that one weekly general meeting is of more value than a week's curriculum of school-subjects. He believes that if all schools had real self-government—not the brand that makes the pupils do the dirty police work for the teachers—a new generation would face life with a high standard of public morality, and a scheme of values that eliminated the non-essentials. If manners mean “thinking of others, no, feeling for others,” as Neill says,¹ and are thus distinguished from a non-essential code of etiquette, then good manners spring from self-government, for in self-government you are constantly being compelled to

¹ *That Dreadful School*, p. 123.

see the other person's point of view. Asking for no manners at all, Neill regards the fact that his children do have good manners as a tribute to the goodness of childhood.

He considers that learning does not matter, that only character matters, and confesses that he has no interest in how children learn. He and his staff have no new methods of teaching because they do not consider that teaching matters very much; and of course they have a hearty hatred of all examinations. Books are of little value; they are the least important apparatus in a school, and only pedants can claim that learning from books is education. Lessons, however, are provided, although attendance at them is optional; in fact there is a lot of learning in Summerhill, and in all classes much work is done. But in the main, learning is regarded as subsidiary to creative activities in the art-room, pottery-room, wood- and metal-shop, where children make what they want to, and subsidiary also to the ordinary play-activities of childhood. Great stress is laid on the theatre as a medium of creative activity; plays written by staff and pupils are produced, and skits on Shakespeare seem to be preferred to the actual works of the master. It is claimed that the theatre has done more for creation than anything else in the school.

With this perfect example of naturalism before our minds, we may profitably try to take stock of the position. An idealist must allow that a sane naturalism carries the educator a long way. It is little exaggeration to assert that all the recent advance in educational method, that indeed the very ideal of sound method based on the facts of child nature, has come from naturalism. When ways and means of education are considered,

✓ it seems the only sound standpoint to discover the nature of the child and to start with him as he is. But the idealist will maintain that the child must not be left as he is. It is in educational ideals, not in methods, that naturalism fails to satisfy. In naturalism "everything intrinsically valuable disappears from the world; . . . the useful, that which promotes the interests of living beings, each after its kind, in the struggle for existence, becomes the all-dominating value."¹ From the naturalistic standpoint, as usually expressed, no lofty educational aims are derivable. In extreme form the naturalistic aim is mere self-expression with the accompanying cries of "no interference," "no restraint." But if the present self is satisfactory, then schools and educators are superfluous. No doubt we may disregard those extreme manifestations of naturalism that are clear negations of the whole concept of education, for all sane naturalists follow the example of Rousseau in providing an educator. But even so, it is undeniable that in educational naturalism the present and the immediate future bulk largely, obscuring the vision of a goal, and that the aim of the process is little more than adjustment to environment. It is too apt to be satisfied with the natural man, fully developed in one sense, perhaps, but with his intellectual, artistic, and moral possibilities imperfectly realized.

No doubt all depends on the meaning that is given to 'nature.' The form of naturalism which we have been considering does not take that to be external nature, but rather, the nature of man. It assumes, however, that the nature of man is that which he shares to some extent with the animals, that it consists of his instincts, appetites, and primitive emotions; it therefore damps

¹ Eucken: *Life's Basis and Life's Ideal*, p. 27.

down, if it does not altogether ignore, man's spiritual nature. A more profound naturalism might include in its scope that spiritual nature as an essential human attribute, and thus avoid the reproach of discounting it because it is difficult to fit into a biological picture; it might assert that man and his values are part of nature, and that the higher as well as the lower nature of man is 'natural.' Such a naturalism would be within measurable distance of idealism, and it would not be difficult to bridge the gap. But, in its generally accepted form, naturalism needs supplementing and correcting by idealism, and most conscientious naturalistic educators do, wittingly or unwittingly, supply such a correction. They are not content that the child should develop anyhow, and they do work towards a goal, however vague. It is only idealism that can give a clear vision of a satisfactory goal for educative effort; we must therefore turn to idealistic conceptions if we would get things into proper perspective.

REFERENCES FOR FURTHER READING

- ADAMS: *Evolution of Educational Theory*, Chapter IX; *Modern Developments in Educational Practice*, Chapters I, IX, and X.
- CALDWELL COOK: *The Play Way*.
- CRICHTON MILLER: *The New Psychology and the Teacher*.
- CURRY: *The School*.
- GREEN: *Psychoanalysis in the Classroom*; *The Daydream*; *The Mind in Action*.
- MACMUNN: *The Child's Path to Freedom*.
- MONROE: *A Text-book in the History of Education*, Chapter X.
- MONTESSORI: *The Montessori Method*; *The Advanced Montessori Method*.
- NEILL: *A Dominie's Log*; *That Dreadful School*.

NUNN: *Education: its Data and First Principles*, Chapters VII and VIII.

ROUSSEAU: *Emile, or Education*.

RUSK: *The Philosophical Bases of Education*, Chapter III.

SHAW: *Back to Methuselah*, Preface.

THOMAS and LANG: *Principles of Modern Education*, Chapters III, IV, and V.

WATTS: *Education for Self-Realization and Social Service*, Part III, Chapters III and X.

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CHAPTER V

IDEALISM IN EDUCATION

WE have seen that idealism takes many forms in philosophy; that it is an attitude and a spirit rather than a definite doctrine or a set of dogmatic propositions. As in philosophy, so in education the forms of idealism are manifold, constituting a general way of approach to educational problems rather than clear-cut solutions of them. Our purpose now is to look again at some of the facets of idealism, this time from the angle of education, with the object of gaining some general understanding of its vast importance as a philosophical basis of education, and of the guidance it offers in every worthy educational effort. By adopting several modes of approach we may hope to catch something of the spirit that informs them all and reach some general conclusions. We shall see that idealism has more to contribute to the aims and objectives of education than to its methods.

Abandoning metaphysical subtleties and concentrating on essentials, we may begin by reminding ourselves of the fundamental proposition of idealism, that the mental or spiritual is more real or at least more important than the material; that of the two worlds with which we seem to have dealings, namely the physical world and the world of experience, the latter is more in tune with ultimate reality than the former; that reality itself is of a spiritual rather than a material nature. As an educational corollary we have the belief of all

educational idealists that in the last resort the humanities, that is to say the studies which concern man himself, are more fundamentally important instruments of education than the study of positive science. The activities of the mind, the aspects of human experience that we call culture, art, morality, and religion are more likely by their very nature to lead us to the heart of things than a study of objective fact. No doubt it can be maintained that there is no hard and fast distinction between human and objective studies, and that the difference between the two is one in degree rather than in kind. For scientific study is itself an important activity of man's mind; moreover, as we have seen, the positive study of external nature in its profounder aspects may lead certain minds to an idealist theory of reality, and to see the world after all as an embodiment of mind. It is interesting to note that it is pure mathematics, a body of pure ideas, definitely a creation of mind, that Sir James Jeans sees manifest in the workings of the universe. But the positive scientist does, as a rule, keep himself out of the picture, and his results concern the object of experience rather than the experience itself.

If the world of experience is more important, more fundamentally real than external nature, then man the experiencer is himself more important, as Socrates recognized long ago.¹ Another early idealist, turning from the consideration of the heavens, the moon, and the stars to inquire into the nature of man, concluded that he is "a little lower than the angels," is "crowned with glory and honour," and has dominion over all other works of God.² This stress on the dignity of man and the distinctiveness of his nature is the very essence of the idealist position.

¹ See p. 61.

² Psalm VIII.

The famous statue of Rodin, *Le penseur*, powerfully embodies the suggestion that man with his powers of thought occupies a unique place in the scheme of things, and that he is in a different category of being from the highest of the animal creation. This idealist belief does not carry with it any denial of the fact of evolution; it does, however, imply that the biological account of man as the highest of the animals is inadequate and incomplete. Idealists who accept the doctrine of evolution insist that it is the ultimate goal of the evolutionary process, rather than the starting-point or the stages of development, that matters. The notion of emergent evolution is in line with such a position, suggesting, as it does, that as higher levels are reached something emerges that was not there before. Gradually, or perhaps by sudden leaps, new categories of value are entered. The whole process of evolution may consist in getting nearer and nearer to a realization of the ultimate values that lie at the heart of the universe. The old story of the garden of Eden can bear interpretations other than the familiar one, that it describes the fall of man from an original state of perfect goodness. It is possible to read at least part of it as the description of the ascent of man, as an early attempt to present in allegorical form the notion that sometime and somehow in the story of creation man must have stepped up to a new level, becoming a moral being, knowing good and evil like a god. Man came to possess a spiritual nature that enabled him to apprehend moral values. It is the complete realization of these values that is the ultimate goal of evolution, rather than perfect adaptation to any environment; unless, indeed, as idealists we consider man's true environment to consist of this universe of values.

So any naturalistic account of man in terms of his

animal antecedents is at best fragmentary. He cannot be explained in terms of his animal origin, for it is spirit rather than animality that is most truly man, and it is in the former not the latter that we can hope to find the real. Man's spiritual nature is not something just added to man, but the very essence of his being.

Thus the grandeur and worth of human life at its best are emphasized by idealism. Human personality is of supreme value and constitutes the noblest work of God. We have the highest expression of this view in the Christian doctrine of the value to God of each human soul. From such considerations we reach the aim of education specially associated with idealism, namely the exaltation of personality, or self-realization, the making actual or real the highest potentialities of the self. Indeed some Platonic idealists believe that there exists in the nature of things a perfect pattern of each individual, his 'individuality' in Nunn's, not the biological sense of the term; and that it is the main task of education to foster the realization of that perfect pattern in each individual life. The aim is to enable each one to become his highest, truest self. Further, if a fully realized human personality is the thing of supreme worth, it follows that the goal of educative effort must be self-realization for all, not merely for a favoured few. This form of the idealistic doctrine, then, constitutes a philosophical charter for universal education.

We are led to similar conclusions if we follow the penetrating discussion of Rusk in *The Philosophical Bases of Education*.¹ Noting "the recent displacement of interest from man's endowment to his environment," he adopts a two-fold analysis of that environment into (a) material or physical and (b) cultural or mental,

¹ P. 96, et seq.

and proceeds to bring out the distinctiveness of man's nature by comparing his attitude towards these environments with that of the animals.

Animals must accept the physical environment as given; they have practically no power to change it, and they must adapt themselves to it or perish. Man, however, is not in the helpless position of having to accept the physical environment as unchangeable; his inventiveness and his manipulative skill enable him to adapt that environment to his own needs, to mould it nearer to his heart's desire, to create, in a word, an artefactual physical environment. So the naturalistic aim of adaptation to environment is seen to be unsatisfactory and incomplete. Any education worthy of the name can do no less than foster those inventive powers of man that ensure his mastery over the material given him; it must as a minimum aim at increasing his power of creating a suitable artefactual environment. (2)

No doubt a biologist might reply by quoting instances of inventiveness in animals where artefactual environments, such as the nests of birds and the dams of beavers, are created out of given materials; but he would be bound to admit that the attitude of man towards the physical environment does differ enormously in degree from that of the animals, even if it does not altogether differ in kind. With regard to the cultural environment, however, there is a much more profound difference, for in that the animals have no share at all. ["This spiritual or cultural environment is an environment of man's own making; it is a product of man's creative activity." ¹ Religion, morality, art, literature, mathematics, and science are the products of man's moral, intellectual, and aesthetic activity throughout

¹ Rusk: *The Philosophical Bases of Education*, p. 98.

the ages; they are humanities in the truest sense of the word. Culture has grown gradually, and to it many minds in all ages have contributed; it welds together and increases the solidarity of mankind, and it grows by sharing. So this cultural environment is the common heritage of mankind, one that is peculiarly his own. Nature apart from human nature knows it not.

Now a man to be most truly and characteristically human must enter into this heritage of his, re-acquiring and re-creating the common culture for himself and, if possible, adding something to the common stock. Education must help each individual, each generation to do this. And since in coming to share this peculiar heritage of mankind the individual is making the most of himself as a man, we are led again to the notion of self-realization as the educational aim, this time with an enrichment of the meaning of the term. Realizing thus his possibilities as a member of the human family of all ages a man has acquired a priceless possession of which, unlike material possessions, he cannot be deprived; he has laboured for the things which do not perish.

But since the successful absorption of the common culture enables, even impels the individual to contribute to it, it is clear that the more education succeeds with one generation the greater will be its task with the next. As the body of culture is increased the task of education in transmitting it and securing conditions for its further enlargement continually grows more complex. To realize this we have only to compare the curriculum of the medieval university, the seven liberal arts of which a man might justly be called master, with the extensive store of culture in the university of to-day, from which the ablest and most earnest student can do no more than make a selection. As Rusk remarks, "More

efficient and more economical methods will have to be devised to effect this increasing transmission."¹ But with the most efficient and economical methods possible we cannot nowadays hope to take all knowledge to be our province. In the preservation and enhancement of the common culture a division of labour is clearly necessary.

Does mankind actually create his cultural environment, or is he merely entering into a kingdom which exists from everlasting to everlasting? Does man, for example, create the beautiful, or does he find it? Those who accept a static Platonic idealism will take the latter view, regarding values and ideas as there to be found;² those who take a more dynamic, pragmatic standpoint will regard them as something that man himself is bringing into being. It is a metaphysical question whether man in his moral, intellectual, and aesthetic activities is positively adding to the content of reality, or whether he is merely delving deeper and deeper into what has always been there; and the answer to it does not seem to affect the educational conclusions we have reached. If the Platonic view is correct, education must enable mankind through its culture to enter more and more fully into the spiritual realm; if the dynamic, then its task is "to enlarge the boundaries of the spiritual realm."³ In either case the common stock of human culture is continually growing.

Adams discusses the idealistic conception of education mainly from the standpoint of the rationality of the universe. We already saw that the assertion of this

¹ *The Philosophical Bases of Education*, p. 102.

² E.g., mathematical ideas. "I believe that mathematical reality lies outside us, that our function is to discover or observe it, and that the theorems which we prove, and which we describe grandiloquently as our 'creations,' are simply our notes of our observations." G. H. Hardy, *A Mathematician's Apology*, pp. 63, 64.

³ Rusk: *The Philosophical Bases of Education*, p. 100.

rationality constitutes an important proposition of idealism; that if mind is at the heart of things, if the universe is in any sense a thought-process, then that universe, including man himself, must be rational. The universe must be a cosmos, not a chaos; things must be in their very nature reasonable and understandable.

Scientists, of course, assume that such is the case in the physical universe, and their steady discovery of law abundantly justifies such a postulate. But the assumption of rationality becomes more difficult when extended beyond external nature to include the moral universe. The idealist cannot prove it, for, himself being part of that universe, he cannot get outside it and view it objectively. But just as science would be futile were there no uniformity of nature, so would philosophy be futile were the moral universe irrational. The idealist, therefore, pursues his quest for law in the spiritual world.

Browning's cry: "God's in His heaven—all's right with the world" is a statement of the idealist's position which, taken by itself, seems too cheerful and optimistic to many. Leibnitz's statement that "All is for the best in the best of all possible worlds" is similar. It is difficult if not impossible to agree without qualification with the view that whatever is, is right. We have a much more profound statement of the belief in rationality in the words uttered by Jesus in His darkest hour: "In the world ye shall have tribulation: but be of good cheer; I have overcome the world."¹ Here we have a clue. Idealists need not be easy optimists; they may admit the existence of evil as well as good, but they stress man's sense of moral values, his ability and determination to follow good and eschew evil. Taking a long-distance, teleological view, they see the whole universe

¹ John XVI, 33.

working towards a perfect state of rationality. From this standpoint education is man's effort to assist in the attainment of that goal.

Now since man is himself part of this universe, a microcosm within the macrocosm, it is the essence of his nature to work towards a rational unity in himself. As an organism he exhibits "unity in diversity," all his separate parts working together to achieve an end: he does not merely grow, he develops. Naturalism would cordially agree with this statement, but it diverges from idealism as regards the goal of development. If development of an organism be defined as "a self-directed striving after a form to which it has an inherent impulse,"¹ naturalism thinks of that form mainly in terms of the body and its functioning, whereas idealism always insists that the final form possesses a spiritual character.

If, however, a child has an inherent impulse to achieve his own proper form and attain perfection, what room is there for an educator? To this question again naturalism and idealism give different answers. We have seen that naturalism is apt to regard the educator with suspicion and to tolerate his presence only on terms. "Because the child comes from heaven there is a suggestion that the educator comes from another quarter";² the fading of the original glory of the child into the light of common day is due to the well-meant interference of the educator. But idealism will not regard the educator in this unfavourable light. Adams bids us remember that the educator too, in his turn, has had "a cloud-trailing period";² in other words, that he too is a unit in the rational universe. Both educator and educand

¹ Adams: *Evolution of Educational Theory*, p. 284.

² Adams: *Educational Theories*, p. 28.

are parts of the wider organism; both are taking their place and fulfilling their function in the entire scheme of things. The relation between the two is that, for the educand, the educator constitutes the special environmental factor whose function it is to lead him nearer reality, to guide him towards his utmost possible perfection.

Perhaps the clearest answer of idealism to the question of the educator's function is contained in Froebel's familiar metaphor of the Kindergarten. The school is a garden, the educand a tender plant, and the educator the careful gardener. Now, of course, a plant will grow and achieve its own proper form unaided. But while each plant must develop according to the laws of its own nature, while it is impossible, for example, for a cabbage to develop into a rose, there is yet room for a gardener. The good gardener by his art sees to it that both his cabbages and his roses achieve the finest form possible. His efforts produce a finer result than would be achieved by the plant without him, yet it is in the nature of the plant to achieve that result under suitable conditions. The naturalist may be content with briars but the idealist wants fine roses. So the educator by his efforts assists the educand, who is developing according to the laws of his nature, to attain levels that would otherwise be denied him.

Thus we again reach the conclusion that self-realization is the goal of life and the aim of education. Adams maintains that of the many ideals of education, self-realization is "the one that is specially associated with idealism."¹ Idealists are bound to agree to it in some shape or form; indeed, it may be said that the difference between idealistic and naturalistic aims is just the

¹ *Evolution of Educational Theory*, p. 298.

difference between self-realization and self-expression, and that any educational theorist who proclaims the former rather than the latter is, wittingly or unwittingly, in the ranks of the idealists. Further, the discussion of the relation between educator and educand points to the conclusion that in the educative process the educator as well as the educand is working out his own salvation, that both indeed are achieving self-realization by interaction with one another.

But Rusk's stress on the common cultural values guards us against any possible misunderstanding of self-realization as implying an isolated or self-sufficient attitude on the part of the individual. He reminds us that "man's higher or spiritual nature is essentially social," and that "the social is an expression of man's rational or spiritual—hence universal—nature."¹ The individual can realize his full potentialities only as a member of the human family, participating in and enhancing the cultural values that are the common possession of all mankind. In affirming the real existence of spiritual values, their eternal nature, their universality, idealism enriches the social concept of education and leads us to give due weight to it.

When Socrates required a companion in his search for truth, maintaining that the agreement of two minds was essential if truth was to be established, he was making the great assumption of idealism that truth is there to be found, eternal and unchanging, independent of time and circumstance. Different minds proceeding from the same data and thinking correctly must reach similar conclusions; moreover, under the same conditions, one mind at different times must reach identical conclusions. As the Bellman said: "What I tell you

¹ *The Philosophical Bases of Education*, p. 43.

three times is true.”¹ The agreement is due to the universality of truth itself. The same is true of morality; universal moral principles, since they, according to idealism, exist in the nature of things, should make the same appeal to different minds; and these minds find common ground in apprehending them. Whatever is right, is right always, and for everyone. Kant suggested the test of universality as applied to the moral law when he proclaimed his categorical imperative: “So act that the maxim of thy will may always hold good as a principle of universal legislation.”

We have seen that the Platonic idealism is a working-out of the position that spiritual values are eternal and unchanging, that they are real ideas or essences which possess universal character. Together they constitute the Good. The end of life is to acquire “an inner relation to infinity,”² to get into harmony with the soul of the universe by finding and contemplating the Good: the function of education is to help us in our exploration of the ultimate, universal values, so that “the truth of the universe may become our truth and give power to our life.”³ Since the Good that is sought possesses universal character, it follows that personalities developed by the search for it will have much in common, since they are severally in harmony with the soul of the universe. “The development and the experiences of the spiritual life . . . unite individuals inwardly; the destinies of individuals receive their particular nature from such a common life.”⁴ Thus the developed personality, the realized self of idealism, is a principle not of separation but of unity among mankind. From

¹ Lewis Carroll: *The Hunting of the Snark*.

² Eucken: *Life's Basis and Life's Ideal*, p. 370.

³ *Ibid.*, p. 97.

⁴ *Ibid.*, p. 245.

this standpoint we see that education for self-realization does full justice to a social aim. The educator can help his pupil towards true self-realization by regarding him not as "a particular and exclusively individual being," but as "a being in whom a new and universal life seems to emerge."¹

Idealism's frank acceptance of values in the scheme of things, along with its recognition of the spiritual capacity in man to apprehend these values, leads it to view psychology as an incomplete study of man and a correspondingly inadequate basis of educational theory. Aspiring to rank as a body of scientific knowledge, modern psychology has taken the positive attitude of science and sought to study objectively the facts of behaviour and their causes. It has adopted the causal principle that has been so fruitful in the advancement of science, and postulated determinism. Hart formulates the principle of psychological determinism thus:

In the psychical world, as in the world of matter, every event must have a cause. Provided that the necessary antecedents are present, then the result will inevitably follow; and if we see the result, then we know that certain definite causes must have combined in order to produce it. Chance has no more part in psychology than it has in physics. Every thought which flits through the mind, however casual or irrelevant it may seem to be, is the only thought which can possibly result from the various mental processes which preceded it. If I am asked to think of a number, it is apparently a matter of indifference to me which number I select. In reality, however, the number is definitely and absolutely determined by the mental state of the moment—one particular number will inevitably appear in the mind, no other is possible. This position will perhaps strike the reader as

¹ Eucken: *Life's Basis and Life's Ideal*, p. 343.

strained and unreal, but unless it is adopted as a preliminary axiom, no science of psychology can exist. Whatever our private philosophy may be, so long as we are thinking psychologically and scientifically, we must subscribe to all the implications of the law of causation.¹

Not all psychologists are so frank as Hart in telling us exactly where they stand; but practically all of them to-day do regard behaviour as explicable and predictable in the scientific sense, even if they have not yet succeeded in demonstrating that such is the case. Good and bad forms of behaviour are of equal interest and importance; the moral evaluation of behaviour is specifically excluded from a study which, we are told, is positive, not normative.

Educationists do as a rule recognize that there is a normative aspect of their study, and that they must go beyond psychology in their quest for aims and values in education. But writers on educational psychology are usually content to say this and to proceed with the psychological account of education, leaving the question of values to other people. The result is frequently unfortunate, for whatever the private philosophy of the writer may be, the reader is apt to get a distorted picture of the whole educational field. Because values, norms, and standards are relegated to the background, if not neglected altogether by educational psychology, the student, infected by the psychological virus of to-day, is apt to neglect them in his theory and practice. Moreover, the deterministic standpoint of psychology, if not corrected, leads to an attitude of determinism in education. The results of mental testing, for example, taken by themselves, lead the educator to the pessimistic conclusion that an individual's achievement is strictly

¹ *The Psychology of Insanity*, p. 60.

determined by his hereditary endowment; that it is nature, not nurture, that counts in the final result. Early formulations of the instinct doctrine in psychology, too, which pictured man as driven *a tergo* by instinctive forces inherited from animal ancestors, have in many quarters had the effect of engendering a fatalistic attitude regarding man's higher spiritual aspirations.

It is only idealism that can supply an adequate corrective to such determinism. The idealist asks: "What if the principle of determinism in human behaviour and thought is an overstatement? What if our conviction of free-will is not a delusion but a reality?" If his doubts are justified, he must deny that a psychology based on determinism can provide a complete account of man. If he accepts the present conclusion of psychology that an individual's maximum intellectual stature as measured by tests is strictly determined by heredity, he maintains that the tests do not measure everything, and even doubts whether they measure the most important thing. He asserts that the spiritual values which a positive psychology excludes may be fostered by nurture, and that the task which education ought to attempt is always possible of achievement.

Rusk points out¹ that in the question of moral values psychoanalysis occupies an interesting position, for it really assumes their existence in its fundamental notion of conflict between the *Id* and the *Ego*, that is, between the instinctive tendencies and the ideal values.

The psychoanalyst must posit the existence of the latter, otherwise there would be no conflict, and he would find himself with his occupation gone—Saul is also among the prophets . . . Psychoanalysts are thus witnesses to the belief in an idealistic interpretation of reality.²

¹ *The Philosophical Bases of Education*, p. 121, *et seq.* ² *Ibid.*, p. 124.

It may, then, be claimed that some systems of education based on psychoanalysis, in spite of their psychological foundation, are not foreign to the idealist's conception. In helping the child to resolve his conflicts the educator is helping to reconcile him to the whole of reality and enabling the spiritual values to triumph.

But although psychology in some of its many forms may imply the existence of ideal values, it has no satisfactory account to give of them. From its positive standpoint it may be able to explain why some people are capable of high intellectual achievement, others incapable; but it has scanty explanation to offer of the fact that the most ordinary people are capable of heights of heroism and altruism, that they have a sense of value in their behaviour. It is in its exclusion of values that it forfeits any claim it might have to be a complete foundation of education. Idealism, taking values as given, maintaining that they are real and that an essential, outstanding element of human nature is its power to grasp them, denies that a positive psychology which ignores values can ever furnish an adequate account of man. "Psychology," says Rusk, "must either abandon its definition of psychology as *positive* or its claim to provide a complete account of the mental life."¹ Any complete account would regard values as "basic factors of our psychical nature,"² not seeking to demonstrate that they evolve out of instincts or anything else. If we accept idealism we must agree that "to ignore such factors is to render educational psychology profitless,"² for the task of education is to develop the child's innate capacities for appreciating value, to lead him to apprehend and realize in his own life the true values. Without educative influences they remain

¹ *The Philosophical Bases of Education*, p. 28.

² *Ibid.*, p. 118.

dormant; education is an awakening to a conscious appreciation of them.

What, then, are the spiritual values the apprehension and appreciation of which is the end of life and of education? If we can answer this question with any degree of definiteness we shall have a criterion by which we may judge the worth of any educative effort and the comprehensiveness of its result.

Plato in some passages talks of the Form of the Good, in others of the Supreme Beauty as the goal of our spiritual pilgrimage; and we have the authority of A. E. Taylor¹ behind us in saying that for him the two were identical. We are familiar too with Keats's identification of truth and beauty:

"Beauty is truth, truth beauty"—that is all
Ye know on earth, and all ye need to know.²

Most of us, however, would wish to know a little more and to have, if possible, a working analysis of the supreme good, even if the products of the analysis are but different aspects of that one ultimate notion. A threefold analysis of the spiritual values into truth, beauty, and goodness is commonly accepted, along with the corollary that man's spiritual activities are also threefold, the intellectual, the aesthetic, and the moral. The simple and beautifully expressed statement of this view by A. Clutton-Brock, in a little book³ written under the shadow of the Great War of 1914-18, will serve as a basis of discussion. He says:

There is a philosophy of the spirit which asserts the supremacy of the spirit and which has established the truth about the nature of man and the nature of the

¹ *Plato, the Man and his Work*, p. 287.

² *Ode on a Grecian Urn*.

³ *The Ultimate Belief*.

universe, a truth which every man can confirm for himself by his own experiments. The philosophy of the spirit tells us that the spirit desires three things and desires these for their own sake and not for any further aim beyond them. It desires to do what is right for the sake of doing what is right; to know the truth for the sake of knowing the truth; and it has a third desire which is not so easily stated, but which I will now call the desire for beauty.

These three desires, and these alone, are the desires of the spirit; and they differ from all our other desires in that they are to be pursued for their own sake, and can, indeed, only be pursued for their own sake. If they are pursued for some ulterior end, they change their nature.

So the spirit has three activities, and three alone, as it has three desires: namely, the moral, the intellectual, and the aesthetic activities. And man lives so that he may exercise these three activities of the spirit, and for no other reason.¹

This uncompromising idealism asserts that each value is unique and that none can be expressed in terms of the others. Man does not desire to know truth or to find beauty in order to be good; art is definitely for art's sake, not for the sake of morality, and it has no moral purpose whatever. Goodness, truth, and beauty are seen to be absolutes, each existing in its own right and entirely desirable in itself. Clutton-Brock bids us examine our own experience to confirm the truth of his doctrine of the absolute, independent nature of each of the values, and his book is an eloquent argument in support of such a conclusion.

Now truth, beauty, and goodness are seen by some to correspond to the tripartite division of experience into cognition or the knowing experience, affect or the feeling

¹ *The Ultimate Belief*, pp. 20, 21.

experience, and conation or the striving experience, generally accepted by psychology. Superficially this view is plausible, but on examination it appears to be insecurely based. Clearly, one cannot proclaim the inadequacy of positive psychology in the sphere of values and at the same time use its conclusions as premises from which the spiritual values of man may be deduced. At best the correspondence is of the nature of analogy, and argument by analogy is dangerous. In any case a deeper examination of the views of the psychologist reveals the fact that, for him, knowing, feeling, and striving are mere hypostatizations; they have no separate, independent existence, and are merely different ways of regarding experience, which is one and indivisible. We cannot have a state of pure knowing without feeling and striving; we cannot feel without knowing and striving, nor can we strive without knowing and feeling. And it is certain that any effective pursuit of truth, or of beauty, or of goodness requires all the powers of knowing, feeling, and striving that we possess. Thus, even if the threefold analysis of man's experience is accepted as exhaustive, it does not follow that a threefold analysis of his spiritual values is complete. There may possibly be further spiritual values which man may know, about which he may feel, towards which he may strive.

Religion is such a value; and we are glad to follow Rusk¹ in desiring to add it to the list of man's spiritual activities. While it may readily be admitted that religion has common ground with the pursuit of truth, or of beauty, or of goodness—that in one way it is akin to morality, in another to aesthetics—it seems clear that in its essence it is different from any of these, and that it can legitimately claim independent status.

¹ *The Philosophical Bases of Education*, p. 103, et seq.

In particular, the distinction and the relation between religion and morality is a question of considerable interest and importance. What is religion? If we seek a general notion of religion that will include at the same time its most primitive and its most exalted forms, we find it in A. S. Peake's definition, "Fellowship with the unseen."¹ Religion is the reaching out of the soul towards what is conceived to be God; it is the soul's apprehension of God and its sense of union with Him. The characteristic attitude of religion is that of awe, reverence, and worship.

Morality has usually a social reference. The morality of a primitive social group is merely the *mores* or customs that make for the well-being of that group as a whole. As the conception of the social group is enlarged, the ideal of loyal adherence to the *mores* may be sublimated to an ideal of the brotherhood of man, but it is still conceived of in terms of its social reference. Without such reference, however, morality is seen to be, at its highest, the steady pursuit of that spiritual value we have called goodness, the quest after personal perfection.

Thus religion and morality are not the same thing; indeed they need have nothing to do with each other. Morality may be quite independent of religion, and moral codes in their essence require no religious sanctions. Many highly moral people have no religion; seeking no fellowship with the unseen, even disbelieving in the existence of superhuman powers, they may still profess and practise the loftiest morality. It is equally true to say that religion need not lead to goodness. Primitive religions may be positively immoral in their modes of expression; and genuinely religious people, even in our

¹ *Christianity, its Nature and its Truth*, p. 2.

present-day sense of the term, are not infrequently less moral than their agnostic neighbours. Earnest students of the Old Testament sometimes wonder why Jacob appears to be, to use a Scots phrase, so "far ben" with God, although he was clearly no better than he should be in matters of everyday conduct. The explanation lies in the distinction we are making. Although not particularly moral, he was, nevertheless, an early religious genius, one who in the dawn of history could have fellowship with God and place himself under His guidance and protection.

Rusk brings out the distinction between religion and morality by contrasting the religious and moral attitudes:

In contrast with the religious attitude, the ethical life is a life of struggle; the moral ideal, after the attainment of which we strive, recedes as we approach. The moral battle goes against us even unto the setting of the sun. Incompleteness, dissatisfaction, characterize the moral life; success but opens up the way to further conflict, whereas in the religious life the individual feels that even if the battle is not already won, he is at least on the side that cannot be vanquished.¹

Thus the quest after goodness implies striving and struggle with no final achievement or satisfaction. Religion, however, does give satisfaction, a sense that all is well; God is from everlasting to everlasting, and the restless soul can find rest in Him. We see the distress of the moral struggle giving place to the exaltation of religious faith in the familiar words of St Paul:

O wretched man that I am! who shall deliver me from the body of this death? I thank God through Jesus Christ our Lord.²

¹ *The Philosophical Bases of Education*, p. 108.

² Romans, VII, 24, 25.

Yet although religion and morality are different in their nature, they tend, as they progress to higher forms, to meet each other and to fuse into a comprehensive whole. We see in the early books of the Old Testament that religious sanctions were introduced to give weight to tribal morality; the "divers laws and ordinances" of the book of Leviticus, which clearly concern the communal welfare of a nomadic tribe, along with the drastic code of punishments for offences against hygiene, are given as what "the Lord said unto Moses." Divine sanction and help were invoked in the bloody struggles with the Philistines, necessary, no doubt, for racial survival. We are reminded here of the prayers made to the God of Battles in 1914, the object of which, realized or not, was to stiffen the backs of the nation. But gradually in the Old Testament we see the conception of the jealous God and the God of Battles giving place to that of a moral God, in whose holy place stands only "he that hath clean hands and a pure heart";¹ who desires "mercy and not sacrifice";² who shows man what is good, desiring nothing of him but "to do justly, and to love mercy, and to walk humbly."³ Finally, in Christianity we have morality and religion ranged side by side. Jesus Himself is worshipped as the Son of God and His ethical teaching has therefore divine authority. No doubt it is possible, while denying the divinity, to accept the teaching of Jesus as the loftiest possible moral code, but such a position undeniably robs the teaching of its special power. Jesus Himself quoted as the supreme commandment:

Thou shalt love the Lord thy God with all thy heart, and with all thy soul, and with all thy strength, and with all thy mind: and thy neighbour as thyself.⁴

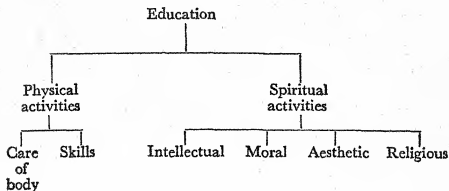
¹ Psalm, XXIV, 4. ² Hosea, VI, 6. ³ Micah, VI, 8. ⁴ Luke, X, 27.

Here we have the highest religion as love of God and the highest morality as love of man. The two are still thought of separately, but they are synthesized in the one law of love.

The principle of love applied to both suggests the lines of a further synthesis, for, in the language of psychology, it is love-sentiments that we wish to cultivate towards goodness, beauty, and truth. If these three are thought of as the divine attributes, then love of them would be love of God Himself, the highest religious attitude of which we are capable. So religion instead of being a separate value becomes the supreme value, comprehending and including the others.

Whether or not such a tentative philosophical synthesis is tenable, we do obtain a safe and comprehensive working criterion for spiritual values in education by adding religion to goodness, truth, and beauty. Education must be religious, moral, intellectual, and aesthetic. None of these aspects may be neglected if a harmoniously balanced personality is to be the result. Nor must we forget the physical aspect of education, which may be seen as twofold. Firstly, the health and fitness of the body must receive due attention, for without such health and fitness the pursuit of the spiritual values is seriously handicapped. Secondly, there must be a fostering of the bodily skills that are the executive instruments of man's invention, enabling him to create an artefactual physical environment more in accordance with his desires and needs than the one given him. Physical and spiritual activities are not, of course, entirely separable, but have a certain amount of common ground. Moral values, which are spiritual, can be found in physical activities; intellectual values are pursued in the application of

skills to the problems of the physical environment; and aesthetic values are discovered in the mastery man acquires over his material in his crafts. Recognizing, therefore, a certain danger of cross-classification, and not suggesting rigid lines of demarcation, we accept the following¹ as a scheme for a complete and generous education:



REFERENCES FOR FURTHER READING

ADAMS: *Educational Theories; Evolution of Educational Theory*, Chapter X.

CLUTTON-BROCK: *The Ultimate Belief*.

HOLMES: *What is and What might be*.

LIVINGSTONE: *The Future in Education; Education for a World Adrift*.

RUSK: *The Philosophical Bases of Education*, Chapters V and VI.

THOMAS and LANG: *Principles of Modern Education*, Chapter III.

WELTON: *What do we mean by Education?* Chapter II.

¹ The table embodies a summary of Rusk's conclusions in *The Philosophical Bases of Education*.

CHAPTER VI

PRAGMATISM IN EDUCATION

FROM its very nature pragmatism can give no clear formulation of educational aims in advance; it cannot, without being false to its own principles, accept any *a priori* scheme of values as a goal towards which educative effort is to be directed. Education for the pragmatist, therefore, is not the disinterested pursuit of the eternal spiritual values which we have found in our consideration of idealism; its task is not to get into tune with reality by discovering universals. For values have no prior existence; they are created by a process of successful experimentation and emerge as problems are solved. The most general educational aim of the pragmatist is just the creation of new values; the main task of the educator is to put the educand into a position to develop values for himself.

Although the pragmatist must query the analysis of spiritual values reached by the idealist, he might agree that education should have its intellectual, aesthetic, moral, and religious as well as its physical aspects, regarding these as major modes of activity through which values may be created. Such activities, however, are pursued not for their own sakes but only with reference to human needs. For the pragmatist the disinterested pursuit of knowledge has little meaning; there is no intellectual education for its own sake. Similarly there is no disinterested pursuit of beauty or of ultimate moral principles; the latter are merely generalized modes of

conduct which eventuate in satisfactory results. Again there is no quest for God as the Absolute; the pragmatist regards a belief in God as justifiable only if, unlike Laplace, he has need of that hypothesis.

In short, he regards as misleading our notion that education is the dynamic side of philosophy, that a sound educational theory is the reflex of a true philosophy of values. It is philosophy which issues from education rather than the other way round; philosophy is the formulation of the ideas underlying a successful educational practice, that is to say, one which culminates in the creation of values. As Dewey puts it:

“Philosophy of education” is not an external application of ready-made ideas to a system of practice having a radically different origin and purpose: it is only an explicit formulation of the problems of the formation of right mental and moral habitudes in respect to the difficulties of contemporary social life. The most penetrating definition of philosophy which can be given is, then, that it is the theory of education in its most general phases.¹

The pragmatist regards the child as a potential creator of values in a given environment; for him, therefore, the data of education are the child and his physical and social environment, the interaction between the two constituting the child's experience. Pragmatism in education aligns itself with naturalism in starting with the child as he is; but, perhaps more consciously and deliberately than naturalism, it seeks to modify the original nature of the child by providing him with a helpful type of experience, particularly that of a social character, in which he has direct participation. It is the child's nature to experiment with life, and he is

¹ *Democracy and Education*, p. 386.

encouraged to do this, to contrive new responses to deal with the new situations of which his educator sees that he has a plentiful supply. But since life itself is experimental there is no definite goal towards which the child must advance. Any attempt on the part of the educator to prescribe specific goals or to decide the child's purposes for him stultifies true education.

✓ The scepticism of the pragmatist as to the prior existence of values is again reflected, as in the case of the naturalist, in his deprecation of external standards and authority, and his exaltation of the needs, desires, purposes, and interests of the child himself. Education consists in the direction of impulses, interests, and abilities not towards the realization of a scheme of values, as the idealist contends, but rather towards the satisfaction of the felt wants of the child in his environment. There is thus an entire avoidance of conflict between the purpose of the child and that of the educator, for the latter tends to eschew altogether any specific purpose of his own.

Amis. The result looked for in such a conception of education is, so far as the individual is concerned, the cultivation of a dynamic, adaptable mind which will be resourceful and enterprising in all situations, one which will have power to create values in an unknown future. American pragmatism, however, is certainly not guilty of neglecting the social aspects of education, for it believes that such minds will inevitably forge a better state of society, one in which human wants will be fully satisfied. But it is individual effort and resource that will achieve this. There is tremendous faith in the individual and in democracy; there is an invincible belief in human progress and the perfectibility of man, these being brought about by individual development and achievement in

a social medium. Perhaps the optimism of pragmatism as regards the potentialities of the individual leads it too easily to ignore innate differences in capacity. It is true in a theoretical but hardly in a practical sense that every boy in an American school is a potential occupant of the White House.

The difference between idealism and pragmatism is largely the difference between the accepting of values towards the realization of which effort is to be directed, and the regarding of them as something created by man himself. As has been remarked earlier,¹ pragmatism is within measurable distance of a dynamic idealism. Rusk regards it as "merely a stage in the development of a new idealism . . . an idealism that will do full justice to reality, reconcile the practical and the spiritual values, and result in a culture which is the flower of efficiency and not the negation of it."² An idealist welcomes the belief of the pragmatist in the perfectibility of man, since it approaches his own notion of exalted personality. Pragmatism, however, stresses human purposes and the satisfaction of human wants rather than one grand purpose towards which the universe is to move. It is emphatically humanistic. Man is the measure of all things for the pragmatist as for Protagoras, the sophist; and in his years of development the child is the measure of all things educational.

Pragmatism, since it regards philosophy as the theory underlying successful practice, naturally affords us more help in the methods than in the aims of education. As regards educational method indeed we may gladly and profitably accept much of its teaching. We find that it questions many of the traditions of the schools: this occasions no surprise when we reflect that it is

¹ See p. 83.

² *The Philosophical Basis of Education*, p. 33.

sceptical as to the soundness of the traditional standpoint of philosophy itself. Refusing to accept established procedure merely because it is established, it warns us against allowing ancient and outworn modes of thought any longer to dominate our educational practice, and bids us be enterprising and experimental in our methods.

It protests emphatically against the notion that the child should sit deferentially at the feet of any teacher, however inspiring, learning in humble and relatively passive fashion what is prescribed from above. It does not want him to acquire merely the results of other people's thinking; it rather wants him to forge for himself the knowledge and skills necessary to deal effectively with the situations of real life. Education is not so much teaching the child things he ought to know, as encouraging him to learn for himself through experimental, creative activity. True knowledge is not the acquiring of a dead culture, particularly from books; it is rather the power to do the right thing in a given situation. Pragmatism always tends to stress action rather than reflection; it countenances no divorce between theory and practice.

Thus the well-worn teaching maxim, 'learn by doing,' may be regarded as an important corollary of pragmatism in educational method. Pragmatism constitutes a charter for the teacher who distrusts bookishness and believes that the child learns much better from his own activity than from constant instruction. But it goes much further than merely to call our attention to the importance of practical work as a means of instruction in all subjects. We might say that the most general method of educational pragmatism is putting the child into situations with which he wants to grapple, and

providing him, at the same time, with the means of dealing with them successfully.

From such an angle it must condemn the traditional division of the curriculum into subjects of instruction. Watertight compartments between one subject and another must be broken down, for it is human activities that are important, not school-subjects and the matter they provide to be learnt. Instead of working at separate subjects the pupil is encouraged to draw freely upon all knowledge that is relevant to the activity on which he happens to be engaged. Any studies he undertakes are motivated by his desire to solve his own problems, and are viewed and valued from the standpoint of their utility in dealing with such problems.

One does not need to be a whole-hearted pragmatist to applaud the protest against rigid lines of demarcation between one subject and another, and to join in the old cry for integration of the learning-process. Adams called our attention to a definite school of 'integralists' in education, who, following the authority of Comte and Descartes in proclaiming the unity of intelligence and the unity of knowledge, asserted that all true learning must be integral, and that educators "ought to abstain from dividing and parcelling out what nature has made one and indivisible."¹ The criticism of much current practice in this respect is, in the words of Lavisé, "a case of a fragment of an educator addressing itself to a fragment of a pupil" and, as Adams himself adds,² "about a fragment of a subject." Aldous Huxley sees the result as bits of information existing "not as parts of one vast continuum, but in isolation, like so

¹ *Evolution of Educational Theory*, pp. 189, 190.

² *Modern Developments in Educational Practice*, p. 17. See also *Evolution of Educational Theory*, p. 193.

many stars dotted about in a gulf of black incomprehension." ¹

It is generally agreed that school studies should be integrated inside the school as their counterparts are integrated in the world outside. Classical education used to provide a unifying principle to a certain extent. But what is to be the principle of integration to-day? Let it be said at once that an able pupil will create his own 'core' for his studies. That, however, does not absolve the educator from responsibility in the matter. Theoretically, no doubt, a unifying principle is found in the rounded whole of human knowledge itself, including all the humanities and all the sciences; but in practice such an integration is impossible of achievement, even if it were deemed desirable. The *Spens Report* suggests, for a core of the curriculum, "the teaching of English and that assembly of subjects which are often loosely spoken of as the English subjects," ² such as English Literature, Composition, History, Geography, Scripture. But can this assembly of subjects really be called a 'core'? Aldous Huxley proposes that the integrating factor must be man himself, on the grounds that "man is the only subject in which, whatever their type or the degree of their ability, all men are interested." ³ "Co-ordination of knowledge and experience," he declares, should "be made in human terms." ⁴

For the pragmatist, the principle of integration is the life and experience of the pupil in general, and his present activity in particular. He realizes that human knowledge and skill present myriad aspects, and that it is idle to contend that integration can be secured by comprehensiveness of treatment. But he bids the

¹ *Ends and Means*, p. 197.

² *Ends and Means*, p. 200.

³ P. 173.

⁴ *Ibid.*, p. 199.

educator remember that he is dealing with one mind, and points out that the unity of the knowledge and skill that that mind acquires will be secured if such knowledge and skill arise from purposive activity, from striving to attain a desired end. Pragmatic methods will leave the child in no doubt of the interdependence of the various aspects of his learning.

Such a reminder, obviously, is especially necessary in the work of the secondary school. There, especially, we are apt to forget that "subjects were not invented for scholastic purposes, but are the tools and instruments which the human race has crystallized out of its experience in order to understand the world in which it lives."¹ The pragmatist tells us that even in this sacred domain of higher learning the problem of integration must be solved. The useless lumber of learning ought to be ruthlessly discarded, and the remainder significantly related to the life of the pupil. In America the pragmatist practises what he preaches; having worked out integrated systems of learning in elementary schools, he has at least got the length of experimental procedures to solve the problem in secondary schools. We in this country have undoubtedly much to learn from him, and we might, with great profit, follow his example.

We can cordially agree with the stress that pragmatism lays on the integration of the learning-process. There are, however, one or two forces acting against thorough-going applications of this principle. Someone will ask: "What about examinations?" a question to which it is difficult to return a polite answer. Raymont, however, does reply politely, if pointedly, by saying, "If the present examination system is to be regarded as irrevocably fixed, we may as well cease to think about

¹ *Spens Report*, p. 78.

education at all.”¹ A system of external examinations does not help matters, to put it mildly. But, if it is that system which prevents us from applying a sound educational doctrine, we must constantly work for its reform, insisting that our results should be assessed by methods which conform to enlightened practice, rather than tamely directing our practice towards an artificially fixed standard of results.

It is undeniable also that integration tends to be defeated by a system of specialist teachers. For the cobbler there is nothing like leather; and for the specialist teacher of mathematics or Latin there is, all too frequently, nothing but mathematics or Latin. In the old type of elementary school, where one class teacher taught all subjects, integration was much more easily achieved; such a system undoubtedly had its merits from this particular point of view. To-day, however, there is general agreement that specialist teachers are on the whole desirable, provided there are adequate safeguards. Thus the joint committee representing the Association of Education Committees and the National Union of Teachers recommends that “some measure of subject-specialization is desirable in all senior schools,”² with the proviso that “the use of subject-specialization makes regular staff conferences and frequent consultations between teachers essential. Only so can the work of the school be properly co-ordinated and only so can the work and character of individual pupils be adequately assessed.”³

We may, if we care, contrast this cautious attitude with the more thorough-going reforms across the Atlantic. Most of us here do take a conservative

¹ *Modern Education: its Aims and Methods*, p. 178.

² *The Extra Year*, p. 103.

³ *Ibid.*, p. 104.

attitude and say that a certain amount of separate and specialized treatment of subjects is warranted by considerations of convenience and thoroughness; but we also agree that there is a danger of its being overdone and we welcome safeguards. Even on pragmatic principles all separation of the curriculum into subjects need not be condemned. If the successful solution of a problem requires a mathematical process or a piece of scientific knowledge, these being of such a nature as to require a certain amount of intensive study to master them, then clearly the problem itself has to be temporarily shelved until such knowledge is gained. No pragmatic educator would object to this degree of separation. Further, the present problem on which the pupil is engaged is not the sole consideration. As a result of education the pupil must be competent to deal with the problems of later life, and his schooling must foster such competence. His here-and-now experience must be capitalized for future use. What we call 'subjects' are the capitalized experience of the race, and the pupil must be made a freeman of this world of common experience. This again the pragmatist would concede; but he would emphasize that such a storing-up of experience must be an active process, and would bid us view such studies from the standpoint of their usefulness in dealing with life-situations, rather than as a disinterested pursuit of knowledge. Thus the study of history would engender the power of dealing with present-day events, while mathematics would provide means of dealing with the physical environment and of organizing various aspects of social life.

With regard to moral training it is generally true to say that pragmatism has a greater sense of responsibility than naturalism. The free activity which pragmatic

systems of education entail does not connote a freedom which is indistinguishable from licence; for not only is the teacher there definitely in the capacity of adviser and guide, but also the pursuit of the chosen activity itself promotes self-discipline. We can accept the claim of the pragmatists that the free, happy, purposive activity of the pupil is likely to result in permanent attitudes of initiative and independence; and that his absorption in real rather than sham activities will bring in its train some of the moral discipline that results from putting his best into a piece of real, creative work. We may also welcome the training in citizenship that comes from the school-activities taking on the character of the activities of the community of which the school is an organon. And since the school, besides being a reflex of the world, is also planned exclusively in the interests of the children, we may agree that the training in character given through activities in school will be even better than that which would be given by participation in real activities outside it.

We feel more doubtful, however, when some pragmatists, true to their principles, go the length of maintaining that each new generation must establish its own moral standards, that the older generation must forgo its time-honoured prerogative of handing on norms of thought and conduct to the young. We may accept the warning that such standards ought not to be imposed by authoritative fiats, and yet agree with Nunn who, in his remarks about the legitimate use of suggestion in education, says that the teacher is entitled to put "his superior knowledge and experience of life into the common stock from which the growing minds of his little community may each draw what it needs."¹

¹ *Education: its Data and First Principles*, p. 149.

Pragmatism and idealism are bound to diverge on such a point; for the latter insists that there are moral principles whose validity is eternal, independent of place and time. These must direct the lives of the new generation as of the old; therefore they must be handed on, however gently and unobtrusively.

Perhaps the most characteristic and thorough-going contribution made by pragmatism to educational practice is the project method, that method which puts in the foreground of the learning process a definite practical problem to be solved. The problem comes first and the learning is incidental to its successful solution; principles, skills, and methods are acquired by the pupil as he experiences the need for them. Any logical arrangement of knowledge, even if regarded as important and desirable, is a distant goal.

An educational project has been boldly defined by Stevenson as "a problematic act carried to completion in its natural setting."¹ His specific mention of a "natural setting" makes most practical teachers in this country pause. More acceptable, perhaps, is a modified definition of a project as "a voluntary undertaking which involves constructive effort or thought and eventuates into objective results."² But the main idea underlying both is that school tasks are to be as real and as purposeful as the tasks of the wider life beyond the school walls; that they are to be of such a nature as to ensure that the pupil is genuinely eager to carry them out in order to achieve a desirable and clearly realized end.

Projects may be of an individual or a social character, but the superior value of the latter, usually called

¹ *The Project Method of Teaching*, p. 43.

² Thomas and Lang : *Principles of Modern Education*, p. 262.

'socialized activities' by the American writers, is generally recognized. They are of maximum value when they are activities which involve participation in social relationships, division of labour, willing acceptance of responsibility to the community; in short, when they are group-enterprises providing rich experience in co-operation. It is undeniable that the carrying-out of such projects does afford valuable preparation for playing a worthy part in a complex society.

At an early stage of education projects can be formulated and carried out in the spirit of play. We hear of infant schools playing at families, or resolving themselves into make-believe post-offices, shops, farms, and even cities. But the activities in such make-believe settings are as real as possible. Clearly, in the case of young children, a project which is to prove fruitful of specific educational results must be one in the carrying-out of which illiteracy and the inability to work with numbers and perform simple money calculations are serious handicaps. This being the case, reading, writing, and simple arithmetic are introduced as the child requires them for the furtherance of the project. Having realized his need for instruction he is eager to receive it.

Enthusiasts admit that at a later stage of education it is not so easy to formulate projects having a satisfactory degree of width and comprehensiveness. Yet an activity such as the production of a play, or even a concert, may easily involve elocution, music, literature, craft-work, needlework, and art; to say nothing of the money-calculations required in planning expenditure, keeping accounts and producing a balance-sheet, or the practical science involved in stage-lighting and effects.

It would be futile to try to suggest projects which might be undertaken in various types of schools and with different ages of pupils, for a satisfactory project, being a function of the school itself, cannot fruitfully be prescribed from outside. Any prescribing of projects would result in the very formalism which it is the main object of the project method to avoid. They should, of course, arise naturally in the life and activity of each school. The writer heard recently of a senior school with a garden which was languishing for want of water; but the use of water for the purpose of irrigation, unfortunately, was at the time frowned upon by the municipal authorities. The astute science master, however, noticed a patch of ground that was constantly wet; inferring that there was in the garden itself a supply of water independent of municipal control, he conceived the project of sinking a well, an enterprise in which his boys, needless to say, were most eager to co-operate. One can imagine the amount of practical science that was learnt in the carrying out of the project, and appreciate the moral value of successfully completing a difficult task. The master cunningly let the boys find out that a stone seemed to weigh less in water than in air, with the result that the explanation of this curious fact in the shape of a lesson on Archimedes' principle was eagerly sought. Pulleys were required, so there had to be an excursion into mechanics. One boy wanted a gauge to indicate the level of the water, and the improvisation of this gave little difficulty. But public opinion decreed that something with a dial would be more elegant; thus there had to be an investigation into the conversion of rectilinear into circular motion. All of this is wholly admirable. A science master is fortunate when such a situation crops up; when

it does, he is wise to seize upon his heaven-sent opportunity.

A remarkable instance of a large-scale and long-term project was, until the outbreak of the present war, to be found at the Lowdham Grange Borstal Institution, where a most courageous and successful experiment in the re-education of young delinquents was being carried out. The project engaged in was nothing less than the complete erection, by the young men themselves, of a set of buildings which many a college inhabited by students of blameless character might well envy. Such a prolonged and important activity had an educational value impossible to over-estimate, carried out as it was by the able, enthusiastic, and enlightened governor.¹ For not only did the youths each learn a trade under the expert guidance of a master-craftsman; they were also re-educated in a spirit of service and co-operation to an extent that could not possibly have been secured by any amount of moral exhortation.

One can indeed be enthusiastic about such examples of projects, and yet wonder whether it is practicable to organize the whole of education in this way. Even if it were, the question arises whether the project method means that we cannot decide in advance what our pupils ought to learn. Certainly this would be pragmatism in an extreme form, and if pragmatists can be complacent about such a difficulty, others, more idealistic, will shake their heads. Most advocates of the project method, however, take no such extreme position; they do decide, in a general way, what they want their pupils to learn, and devise projects, often very ingenious, to secure the purposive learning of these things. The

¹ Mr C. T. Cape.

project, after all, need not assume a dictatorial rôle in the matter of learning.

But even if such be the case, many a conscientious schoolmaster will feel uneasy about the gaps in his pupils' knowledge that any conceivable project or set of projects is bound to leave. For since all learning is to be incidental to the projects there must be gaps, or at least vagueness and lack of system in knowledge. Most practical educators would agree with Professor Godfrey Thomson when he says that "incidental learning, though most important, is not enough."¹ We are probably right if we take the old-fashioned view that there must be at least a minimum of logical arrangement in instruction, that what is learned in the following out of projects needs systematization and organization. For organization of knowledge not only makes for economy of effort; it also capitalizes it for future use. We agree, then, with the cautious conclusion of Thomson that "a judicious mixture of regular drilling with incidental learning is probably best."¹

If, possibly in our conservatism, we are reluctant to accept the letter of the project method, always seeking to deal with the material of real life in a real setting, we may well adopt its spirit, which, after all, is what really matters. And there is no doubt what that spirit is; it is, in the words of Rayment, "whole-hearted purpose on the part of the pupil."² The American educators who are responsible for the project method proper would not claim that they themselves had discovered this cardinal principle of education, although they might legitimately claim credit for more thorough-going applications of it than usually obtain elsewhere.

¹ *A Modern Philosophy of Education*, p. 95.

² *Modern Education: its Aims and Methods*, p. 337.

It is a long time since Adams first familiarized teachers in this country with the *Zielangabe* of certain German teachers, that is to say, "the giving or statement of the purpose of the lesson at the very start," an ideal which, in turn, is "of very venerable antiquity."¹ We can certainly agree that even in the old-fashioned lesson or series of lessons the purpose should be put before the pupil and kept before him, that he should never be left guessing what his lesson is about. We accept whole-heartedly the notion that the drive behind the learning process must be clearly realized purpose.

A lesson on a mathematical topic should normally start with a problem, new knowledge being developed as a means of solving that problem. But the problem need not necessarily be of a practical character; intellect itself can state problems and demand their solution, and here again the learning will be as purposive as in the former case. Whether a practical or an intellectual problem is more suitable as the core of the teaching depends entirely on the interests of the learner; that problem should be selected which will provide the maximum drive and purpose in the learning process. In such procedure we are at least on the way to the project itself, and all the way to its spirit. In allowing that intellectual problems may well supply the requisite incentive in the case of some pupils we avoid the criticism of over-emphasis on the utilitarian aspect of education that is fairly levelled at the project method.

Examples of the giving of purpose in teaching might easily be multiplied. Some schools supply the purposive element in the learning of geography by keeping their pupils in close touch with the journeyings of a particular

¹ *Exposition and Illustration in Teaching*, p. 169.

tramp-steamer, and find the results of such a scheme wholly encouraging. There is also the 'how it works' method of learning science. Instead of learning the principles of current electricity and subsequently applying them to electric bells, the pupil starts with the actual bell and discovers general scientific principles in seeking to understand its working. Most boys are enormously interested in a proposal to understand the functioning of a motor-bicycle, but are cool towards an explanation *in vacuo* of the principles involved. A class at an evening institute may have little interest in academic science; yet if the learning of science has as a core the construction of wireless sets the case may be very different. We can agree that such purposive learning of science is excellent, and yet maintain that there is a place for the intelligent study of principles before applications in the case of students whose interests are primarily intellectual. For, as Rusk remarks, we need not accept the position "that the only alternative to employing the pragmatic method is to follow a rule blindly . . . there is also the possibility of applying a rule intelligently."¹

Perhaps sufficient examples have been brought forward to indicate how we can catch the spirit of pragmatism and the project method in our teaching without sticking too narrowly to the letter. In closing the present discussion we cannot do better than quote Raymont's conclusion on the matter:

The best service which the project method can render to education is to suggest that whole-hearted purpose on the part of the pupil should in the greatest possible degree infuse the most ordinary of school lessons. The worst service it can render is to generate the notion that a

¹ *The Philosophical Bases of Education*, p. 84.

certain type of procedure, imitative of adult activities in real life, is likely to prove a panacea for all the ills of school life.¹

REFERENCES FOR FURTHER READING

ADAMS: *Modern Developments in Educational Practice*, Chapter X.
DEWEY: *Democracy and Education*; *The School and Society*; *Schools of To-morrow*.

KANDEL: *American Philosophy of Education* (Article in *The Year Book of Education*, 1936).

KILPATRICK: *The Project Method*.

RAYMONT: *Modern Education: its Aims and Methods*, Chapter VII and Appendix.

RUSK: *The Philosophical Bases of Education*, Chapter IV.

HERBERT SPENCER: *Essay on Moral Education*.

STEVENSON: *The Project Method of Teaching*.

THOMAS and LANG: *Principles of Modern Education*, Chapters III and XV.

THOMSON: *A Modern Philosophy of Education*, Chapter V.

¹ *Modern Education: its Aims and Methods*, p. 337.

CHAPTER VII

FREEDOM AND DISCIPLINE

WE have seen in a general way that divergent philosophies lead to divergent educational systems. Conversely, differences of view on educational questions are, in the last resort, philosophical differences. It is now our purpose to review a few debatable educational topics against the background of our philosophical discussion, in the hope of demonstrating that such debates are really philosophical debates, and that they are incapable of an agreed settlement until there is a general consensus of opinion as to the philosophy on which our educational practice should be founded.

Such a question is that of freedom and discipline. No doubt it might profitably be discussed in a wide political sense, but here we shall confine it to the purview of the school. There is a perpetual oscillation between the two as educational ideals, the pendulum swinging sometimes towards freedom, sometimes towards discipline. It may at once be said, however, that discipline is the traditional conception of education. Education as discipline or training is the notion that has come down to us through the ages; always, or nearly always, our predecessors in the educational field conceived it their function to act on the child, to modify his original nature, in order to lead to a desirable and clearly envisaged result. That this conception of education was prevalent in the middle of the nineteenth century is clear from the quotation from the book of Proverbs

which the founders of Westminster College saw fit to emblazon above the door: "Train up a child in the way he should go; and when he is old, he will not depart from it."¹ But in the years following the Great War of 1914-18 there was a vigorous swing of the pendulum to the opposite side. We heard loud cries of "Education through Freedom"; we were earnestly enjoined to cease our attempts to train the child, and in place of our training to give him freedom to express himself. And many of us could not make up our minds which it ought to be. Aldous Huxley vigorously indicts our vacillating attitude in the matter:

We educate young children for freedom, intelligence, responsibility, and voluntary co-operation; we educate older children for passive acceptance of tradition and for either dominance or subordination. This fact is symptomatic of the uncertainty of purpose which prevails in the Western democracies. The old patriarchal tradition co-exists in our minds with a newer and quite incompatible hankering for freedom and democracy. In our enthusiasm for the second, we train up our young children to be free, self-governing individuals; having done which, we take fright and, remembering that our society is still hierarchical, still in great measure authoritarian, we devote all our energies to teaching them to be rulers on the one hand and, on the other, acquiescent subordinates.²

In order to arrive at a clear understanding of the extent to which these two notions of education really diverge from each other, we must inquire into the meaning of the word 'discipline.' Too often there is a confusion between discipline and order. The writer has in his mind an indelible impression of a very worthy, old-fashioned drill-sergeant, who used to impress upon

¹ Proverbs, XXII, 6.

² *Ends and Means*, p. 178.

his pupils that they came to him to learn drill and discipline, his exhortations containing more than an implication of his opinion that in his gymnasium he was supplementing in a valuable way the efforts of his academic colleagues. His methods, however, made it certain that what he really had in mind was order; and, it may be added, in the ability to maintain order most of his academic colleagues were his equals. Conceding the point that it is usually desirable that things should be done decently and in order, that order makes for efficiency and economy of effort, one may still maintain that very good order may be bad discipline. On the other hand, it is generally true that really good discipline will always tend to bring order in its train. What is the real relation between the two?

Rusk¹ gives us a useful reminder that the distinction was quite clear in the writings of Herbart. His terms were *Zucht*, meaning 'discipline' or 'training,' and *Regierung*, meaning 'government' or 'order.' *Regierung* refers to the behaviour of the pupil in school and in class, but *Zucht* bears a wider and higher meaning; it is 'character-training' and it refers to the whole influence of the school in this direction. "The aim of government lies in the present, whereas training has in view the future adult." "To maintain quiet and order in the lessons, to banish every trace of disrespect to the teacher, is the business of government: direct action on the temperament of youth with a view to culture is training." For Herbart the educational aim was morality, but believing, as he did, that "the will takes its root in the circle of thought," he regarded instruction as the chief means of reaching his objective. Now instruction could not proceed without government,

¹ *The Doctrines of the Great Educators*, pp. 222-224.

therefore good government had to be aimed at in order that the pupil might profit by instruction. Government or order, then, was a means by which discipline was achieved. Order and discipline, in fact, are related to each other as means to end. Discipline is much the wider notion, and it ought always to refer to the effect of the school on the pupil's character. It is concerned not merely with outward behaviour, but with the inner motives of conduct. We are in no danger of confusing it with mere order if we accept the Board of Education's pronouncement:

Discipline is the means whereby children are trained in orderliness, good conduct, and the habit of getting the best out of themselves. . . . The crucial test of its soundness is whether it represents a real sense, on the part of the children, of the rightness of the behaviour that is expected of them. It cannot be considered good unless it is founded upon worthy ideas of conduct that are becoming, or have become, embedded in the children's characters.¹

Norman MacMunn in *The Child's Path to Freedom* provided us with a helpful analysis of methods of school government, classifying them as repression, impression, and emancipation. It will be useful to follow his guidance here, first inquiring into the meaning of his terms, and subsequently assessing the value of the methods from the point of view of their effect on character.

Repressionists insist on absolute quiet and order at all times. It is said that in the early days of compulsory education the literal dropping of a pin was on occasion used by inspectors as a test of a school's grant-earning efficiency in the matter of discipline. It must be admitted that severe repression, with corporal punishment

¹ *Handbook of Suggestions*, p. 24.

as its chief instrument, has been in the main the traditional method of school government, although the great educators whose thoughts have come down to us have reacted against it. In most histories of education we see woodcuts of medieval schools with the pedagogue wielding an instrument of torture, or at least being ready to wield it. The rod was indeed the badge of office of the schoolmaster. Professor Cubberley in his *History of Education* tells us that

A Swabian schoolmaster, Häuberle by name, with characteristic Teutonic attention to details, has left it on record that, in the course of his fifty-one years and seven months as a teacher, he had, by a moderate computation, given 911527 blows with a cane, 124010 blows with a rod, 20989 blows and raps with a ruler, 136715 blows with the hand, 10235 blows over the mouth, 7905 boxes on the ear, 1115800 raps on the head, and 22763 'notabenes' with the Bible, Catechism, singing-book and grammar. He had 777 times made boys kneel on peas, 613 times on a triangular piece of wood, had made 3001 wear the jackass, and 1707 hold the rod up, not to mention various more unusual punishments he had contrived on the spur of the occasion. Of the blows with the cane, 800000 were for Latin words; of the rod 76000 were for texts from the Bible or verses from the singing-book. He also had about 3000 expressions to scold with, two-thirds of which were native to the German tongue and the remainder his invention.

To such lengths could repression go in the 'good old days.' The record may raise a grim smile, but its implications are horrible and inhuman. Lives of children must have been made miserable by constant pain and fear, while the time of the pedagogue must have been largely employed in administering penalties and entering up the details in his punishment book.

Repression of this brutal character is a thing of the past, yet older readers, like the writer himself, may have unpleasantly persistent memories, from their own school-days, of reigns of terror in which corporal punishment was the main instrument of government. At the beginning of the century in Scotland a teacher's main article of professional equipment was a strap, and his chief qualification for his work an ability to impose rigid order on a crowd of unruly children. Love of children was apt to lead to slackness in discipline.

No doubt conscientious repressionists found justification for their methods in the doctrine of original sin; believing with Jeremiah¹ that "the heart is deceitful above all things, and desperately wicked," they agreed with the writer of Proverbs² that they could best serve the interests of the child by administering frequent chastisements. No doubt they considered that the ultimate goal was worth the present discomfort. Viewed psychologically, the method of repression may be summed up as a direct appeal to the motive of fear in order to determine certain lines of conduct and inhibit others.

Impression constitutes an entire reaction from repression so far as method is concerned. The compelling power of the educator's personality takes the place of punishment; it is his personal influence, and that of the school-system which he plans and governs, that are effective in ensuring that desirable modes of behaviour are followed. Government thus is through personal example, direct moral suasion, and the indirect influence of good conditions. There is a reign of respect and love rather than one of terror.

Arnold of Rugby and Thring of Uppingham were

¹ XVII, 9.

² XIII, 24.

outstanding as impressionists in the English public schools of the nineteenth century. Not only did they impress their personalities on their own pupils but they also left an enduring mark on the whole system of public-school education. At his best, the impressionist is one of those born leaders of young people whose slightest behest is willingly and eagerly obeyed. Probably most of us, in addition to our memories of repressionists, have kindly thoughts of at least one such wizard whose influence is still with us. It should be realized that in impressionist systems the educator's will does prevail over that of the child; that, although he uses humane means, he does in the last resort coerce; that he has definite standards of behaviour which he makes it his business to establish. From the psychological angle it may be said that, although he eschews an appeal to fear, he does deliberately and definitely tap the submissive propensity of the child.

The emancipationist, however, will have as little to do with impression as with repression. He wants untrammelled freedom for the child, who is to do exactly as his nature prompts him, hindered as little by conscious or unconscious submission to precept and example as by fear of dire consequences. Not only is the educator to refrain from thwarting the child's inclinations and impulses; he is also to refrain from guiding them. This he can best ensure by effacing himself, retiring gracefully into the background and contenting himself with the rôle of a mere observer. Montessori is world-famous as an exponent of this view; Norman MacMunn¹ was a thorough-going emancipationist at Tiptree Hall; and A. S. Neill's views and practice have already been outlined. Emancipation is based on a

¹ See *The Child's Path to Freedom*.

complete denial of the doctrine of original sin—in place of which we have a touching faith in the innate goodness of the child and a whole-hearted acceptance of the Wordsworthian view that he comes from heaven trailing clouds of glory. Appealing neither to fear nor submission the emancipationist exalts the child's self-assertive propensity and takes 'self-expression' as his watchword.

We have, then, these clear-cut positions in the matter of school discipline. What shall we say of them? They ought to be considered primarily from the point of view of their effectiveness in producing discipline in the sense defined; order, after all, is a subsidiary matter, merely a means, while discipline is the end. Which has a good effect on character? Which results in true discipline?

While all but the most thorough-going of emancipationists would concede that there is a place for occasional repression of a mild character, most educators would agree that the effect of continual, systematic repression is wholly bad. Repression will always solve the immediate problem of order in school; but its bad disciplinary effect is seen when those who have suffered it get outside the school walls, or finally leave school. All will concur with the judgment of the Board of Education that "mere repression is effective only while the children are immediately under the authority that exercises it."¹

Further, repression is out of line with democratic ideals. Whatever its place may be in the educational system of a totalitarian régime, it is a thoroughly bad training for the future citizens of a democratic state. Aldous Huxley² says trenchantly:

If your goal is liberty and democracy, then you must teach people the arts of being free and of governing them-

¹ *Handbook of Suggestions*, p. 24.

² *Ends and Means*, pp. 184-185.

selves. If you teach them instead the arts of bullying and passive obedience, then you will not achieve the liberty and democracy at which you are aiming. Good ends cannot be achieved by inappropriate means.

He adds:

Significantly enough, the Montessori Society of Germany was dissolved by the political police in 1935; and, in July, 1936, Mussolini's Minister of Education decreed the cessation of all official Montessori activities in Italy.

In short, if we seek to train people for purposive, self-determined activity and for responsibility, then an appeal to fear, which is the great inhibitor of activity, must be the wrong means to employ.

As to the vexed question of corporal punishment, it would probably be unwise to proclaim an absolute 'Never!' as it may occasionally be necessary and, in its effects, salutary. But recourse to it must always be a confession that better methods have either not been tried or that they have failed; although their failure is not necessarily the fault of an individual teacher in a particular school. Lest it be thought that this view is a reflex of the 'soft pedagogics' of modern times, we turn to the Roman educator Quintilian who, in the first century, an age not generally accused of softness, condemned the practice:

But that boys should suffer corporal punishment, though it be a received custom . . . I by no means approve; first, because it is a disgrace, and a punishment for slaves, and in reality (as will be evident if you imagine the age changed) an affront; secondly, because, if a boy's disposition be so abject as not to be amended by reproof, he will be hardened, like the worst of slaves, even to

stripes; and lastly, because, if one who regularly exacts his task be with him, there will not be the least need of any such chastisement. At present, the negligence of *pædagogi* seems to be made amends for in such a way that boys are not obliged to do what is right, but are punished whenever they have not done it. Besides, after you have coerced a boy with stripes, how will you treat him when he becomes a young man, to whom such terror cannot be held out, and by whom more difficult studies must be pursued? Add to these considerations, that many things unpleasant to be mentioned, and likely afterwards to cause shame, often happen to boys while being whipped, under the influence of pain or fear; and such shame enervates and depresses the mind, and makes them shun people's sight and feel a constant uneasiness.¹

A continual resort to corporal punishment is a degradation of teacher and taught alike. Indeed, it is not too much to say that its constant practice has brought the profession of teaching into a disrepute from which it is only now emerging. The familiar Freudian doctrines of sadism and masochism have shed new light on the "things unpleasant to be mentioned" referred to by Quintilian, and they must be taken seriously. Sadism and masochism are the names given to the tendencies we have to experience a perverted sexual satisfaction in the inflicting and the suffering of pain. Sadism, on the one hand, is a warning to the teacher to be certain, if he can, that his motives in inflicting corporal punishment are unimpeachable; masochism, on the other, renders suspect a favourite defence of the practice, namely that "the little beggars rather like it." One may certainly say, without fear of serious contradiction, that the cor-

¹ *Institutes of Oratory*, Book I, Chapter III, as quoted by Monroe in *Source Book of the History of Education*.

poral punishment of adolescents brings so many dangers in its train that it should never be resorted to.

Emancipation, the opposite extreme from repression, would hardly be defended on the ground that it produces good order. Its advocates, however, regard order as unimportant, if not undesirable. They claim that systems of complete freedom have an entirely beneficial effect on character, that they produce individuals who are fearless in thought and action, who are ready to face any and every situation. These fine results, they say, are achieved through unrestricted self-expression.

But, as always, the question of value comes in. It is relevant to ask whether the self so fostered is really worth expressing. For if not, self-expression is of little value to the individual himself, and of none to other people. Ought we not to aim at the creation of a self that will be of individual and social value? If so, is emancipation the best way of doing it? And it must not be forgotten that social life, even in the most democratic of communities, does not spell complete freedom for the individual. Self-expression must be inhibited when it interferes with the rights, comfort, and convenience of other people. It may well be doubted whether entire freedom in school readily leads to a realization of this cardinal fact.

Extreme doctrines of emancipation frequently seek justification in an appeal to the Freudian psychology, which is so eloquent on the evils which follow from repression of natural propensities. Such arguments hardly bear close examination. The repression against which Freud warns us is unwitting repression, where the subject is unaware that important forces in himself are being dammed up. Nowhere does he teach that an individual must give expression to every felt impulse

if disastrous consequences are to be avoided. Conscious, self-imposed, witting repression of anti-social impulses never harmed anyone.

Further, if the doctrine of emancipation means that order in school is to be positively under suspicion, it is going too far. The child likes to do things in an orderly fashion, and welcomes a certain amount of direction and routine. The Board of Education rightly advises the teacher to "take for granted the existence in his pupils of a desire to behave and work sensibly."¹

Impression, when practised by a teacher of forceful personality, does undoubtedly result in good order. It is equally true that it has a profound effect on character, that is to say a disciplinary effect. We do get our moral sentiments, attitudes, and enthusiasms in the first instance by contagion from admired personalities. As a method impression makes its appeal straight away to the vanity of the teacher who likes to think that he moulds the characters of his pupils. But it is for this reason exactly that the emancipationists cannot speak peaceably about the impressionists. Arnold and Thring are their *bêtes noires*, far more dangerous than the old-fashioned repressionists, whose methods are so obviously wrong that public opinion has become increasingly intolerant of them. Impression, they say, is fundamentally wrong because it damps down originality, cramps individuality, tampers with the sacred personality of the child, produces mere copies of the educator. Thus they disagree with it in principle, not because it has no disciplinary effect but because it has too much.

Others tell us that, whether or not it is a desirable method to adopt, it is generally impracticable on account of the fact that all teachers are not outstanding

¹ *Handbook of Suggestions*, p. 26.

personalities. For one who can practise impression effectively there are ten who cannot. This difficulty may easily be overstated. Even the young, inexperienced teacher is superior to his pupils in age, knowledge, and experience of life, and is therefore in a position favourable for the exercise of impression. Moreover, if his modesty forbids him to expect the deference due to him personally, he may reasonably look for that which is due to his office. Sir John Adams used to ask his students why pupils do, as a rule, obey their teachers. After disposing, in his usual Socratic manner, of ill-considered answers, he would cross-question until the truth emerged that pupils really in the last resort obey their teachers because the latter are the representatives in the school of the wider society outside, and have behind them the authority and backing of organized society as a whole.

It is clear that the issue lies between impression and emancipation, for repression is obviously ruled out of court. Which shall it be? If it is to be both, in what proportion shall the ingredients be mixed?

Now all sensible views of the emancipation doctrine do stop short of a freedom which is indistinguishable from licence. We have seen too that the normal child prefers order to disorder, and, as Aldous Huxley warns us, we may easily be guilty of administering overdoses of freedom to children. He says:

It may be remarked that 'modern' schools may be too 'modern' by half. There is a danger that children may be given more freedom than they can profitably deal with, more responsibility than they desire or know how to take. To give children too much freedom and responsibility is to impose a strain which many of them find distressing and even exhausting. Exceptional cases apart,

children like to have security, like to feel the support of a firm framework of moral laws and even of rules of polite conduct. Within such a firmly established framework there is plenty of room for a training in independence, responsibility, and co-operation.¹

Montessori cannot be accused of indifference to the fulfilment of social obligations and the fostering of polite conduct. She advises her directresses to intervene to the extent of seeing that the school does react suitably on anti-social conduct, the offender being temporarily excluded from taking part in communal activities. There is here no sacrifice of common sense to a theory. The responsibility of the educator is admitted, and influence is not withdrawn, though it is exercised as impersonally as possible through the school environment. But that environment is, after all, the creation of the educator; and in the final analysis the system works because of the influence, however indirect, of a personal educator whose will does prevail and whose purpose is carried out. Montessori does impress and influence by the carefully planned environment which she provides.

In the view of the present writer, however, impression is a much more important and desirable method than the enthusiastic emancipationist will allow. It may help to clarify the matter if we inquire a little more deeply into the meaning of the word 'discipline.' It is useful to remember that 'discipline' and 'disciple' are cognate words. A disciple is one who sits at the feet of his master, as Paul sat at the feet of Gamaliel, learning what he has to teach about life. His attitude is that of the apprentice. Now it is discipleship which most effectively leads to discipline. We may say that disci-

¹ *Ends and Means*, pp. 178, 179.

pline, to begin with, consists in an immature mind being submitted to the influence and direction of a more mature mind, thereby absorbing the attitudes and ideals of that mind. Such ideals and attitudes must be transmitted "from the living, through the living, to the living": there is no other way. There must be a personal educator exerting influence, however gently and unobtrusively he may do it, otherwise there is no education, no discipline.

In seeking to modify the natural development of the educand the educator need not and should not aim at producing a copy of his imperfect self, as the emancipationist accuses the impressionist of doing. He ought indeed to accept a warning from the emancipationist that he may inadvertently be doing this. He can best guard against such a danger if he seeks systematically to direct the allegiance of growing minds to the moral giants of the race, and to the ideals which they have embodied. At the same time he ought to embody those ideals in himself, so far as may be, for it is with him that the educand must start. To begin with, it is to his superior wisdom that his pupils submit; but he will work for the day when they will become fellow-disciples with himself of the greatest, when they will share his acceptance of the "ideals sanctioned by the best and widest experience of mankind."¹ When such ideals are wittingly and willingly accepted as dynamics of conduct, discipline through influence has become true self-discipline, and character has been consolidated.

This, one ventures to hope, may be accepted as a truer and more helpful view of moral education than foolish cries of entire emancipation, no interference, and so on. All sane interpretations of the freedom doctrine

¹ Nunn: *Education: its Data and First Principles*, p. 150.

do involve discipline in this sense. If undue personal influence be deprecated, then it is the school itself that must provide "a way of life that the children recognize as something better and fuller than they could devise for themselves, for only thus will it be able to absorb their energies and command their loyalty."¹ But impression cannot and ought not to be eliminated. Certainly the pupil ought to be as free as possible, provided that he accepts the school's standards of behaviour. If he accepts these willingly and loyally he will have the benefits of freedom and discipline at one and the same time. In short, "if children are to find themselves they must be allowed a sufficient degree of freedom; if they are to develop their powers to the fullest they must be prepared to accept the appropriate discipline and training."²

There is always the danger of interpreting the cry for freedom as freedom to follow any and every inclination to action that may arise in our minds. Such freedom, let us repeat, is mere licence. When ideals have been accepted, when character has been formed and the basis of a strong will established, the individual no longer considers himself free to follow stray impulses. It is rather by denying himself such freedom that he becomes master in his own house, achieving the higher freedom to follow the light that is in him, unhampered by the chains of his lower nature. Self-discipline is the only freedom worthy of the name. "That man is free who is conscious of himself as the author of the law which he obeys."³

It will be realized that the debate between freedom

¹ *Handbook of Suggestions*, p. 25.

² *Ibid.*, p. 67.

³ T. H. Green, quoted by Lord Halifax in a speech to Oxford University, February 27, 1940.

and discipline is but one facet of the debate between naturalism and idealism as philosophies of education. Freedom is the cry of the naturalists, while discipline is that of the idealists. Clearly, if the educand is to succeed in realizing his spiritual possibilities, he must submit to a process of discipline which will enable him to apprehend the great values of life that are stressed by idealism. It is unnecessary to labour the point. Before leaving the topic of discipline, however, it may be pertinent to inquire whether pragmatism has any distinctive contribution to offer.

The 'discipline of natural consequences' is well in line with the pragmatic doctrine that the worth of a line of action is to be judged by its working in practice. Those who advocate such a notion urge that an individual should learn the difference between right and wrong actions by experiencing for himself their direct results. Rousseau tells us that, in the period of negative education, "children should never receive punishment merely as such; it should always come as the natural consequence of their fault";¹ again, that we should see to it that a child's "unreasonable wishes meet with physical obstacles only, or the punishment which results from his own actions, lessons which will be recalled when the same circumstances occur again."² Herbert Spencer later put forward and defended the discipline of natural consequences as the main principle of moral education. The child should suffer the "unavoidable consequences" and "inevitable reactions" of his conduct, experiencing "simply the beneficent checks to action that are essentially at variance with bodily welfare."³ "Very soon recognizing this stern though beneficent discipline, it

¹ *Emile, or Education* (Everyman Edition), p. 65.

² *Ibid.*, p. 49.

³ *Essays on Education* (Everyman Edition), p. 91.

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¹ *Emile, or Education* (Everyman Edition), p. 65.

² *Essays on Education* (Everyman Edition), p. 91.

³ *Ibid.*, p. 49.

becomes extremely careful not to transgress.”¹ Therefore “it is the function of parents to see that their children habitually experience the true consequences of their conduct—the natural reactions: neither warding them off, nor intensifying them, nor putting artificial consequences in place of them.”²

The obvious criticism is that the natural consequences may be out of all proportion to the fault, and that they may do grievous harm to the child. Spencer indeed assures us that the “painful reactions are proportionate to the transgressions”;³ but it hardly needs Hilaire Belloc’s delightful caricatures, which relate the direful fates that overtook Matilda who told lies and Rebecca who slammed doors, to convince us that here he overstated his case. Later in his essay, however, Spencer concedes that “of course, in those occasional hazards where there is a risk of broken limbs or other serious injury, forcible prevention is called for.”⁴ His great contemporary, Thomas Henry Huxley, stressed the harshness of nature’s discipline, urging that as a reason for ‘artificial education.’

Like all compulsory legislation, that of Nature is harsh and wasteful in its operation. Ignorance is visited as sharply as wilful disobedience—incapacity meets with the same punishment as crime. Nature’s discipline is not even a word and a blow, and the blow first; but the blow without the word.⁵

Huxley adds: “It is left to you to find out why your ears are boxed.” While a reasoning adult may set himself to finding the reason, the child can hardly be expected invariably to connect effect with cause. But

¹ *Essays on Education* (Everyman Edition), p. 92.

² *Ibid.*, p. 93.

³ *Ibid.*, p. 91.

⁴ *Ibid.*, pp. 104, 105.

⁵ *Collected Essays*, Vol. III, p. 85.

if he fails to appreciate the fact that it is his own actions which lead to this or that consequence, it is difficult to see that moral culture can result. Even if he succeeds in doing this, the morality which he develops is decidedly egocentric, tending to neglect the rights and happiness of others. Morality has essentially a social reference; and experience of natural consequence leads to an attitude of prudence and self-interest rather than to true morality.

As a method of moral training, discipline by natural consequences is inadequate to the same extent that pragmatism is an insufficient basis for a philosophy of education. There is no notion of absolute morality behind it; and if one holds fast to the tenets of idealism one can regard it at the most as a useful method of moral training in early childhood. It is worthy of note that Rousseau advocated it only for the period of life when the child's soul was to lie fallow: his statement of the moral law—"a good action is only morally good when it is done as such and not because of others"¹—is absolute enough to satisfy any idealist. But no such lofty conception of morality is to be found in Spencer. Instead we have the sweeping statement that "from whatever assumptions they start, all theories of morality agree that conduct whose total results, immediate and remote, are beneficial, is good conduct; while conduct whose total results, immediate and remote, are injurious, is bad conduct";² and that therefore "we cannot refuse to class bodily conduct as right or wrong according to the beneficial or detrimental results produced."³ An idealist, however much he may admit the logical

¹ *Emile, or Education* (Everyman Edition), p. 68.

² *Essays on Education* (Everyman Edition), p. 91.

³ *Ibid.*, p. 91.

clarity of Spencer's argument, is bound to query the truth of his major premise.

REFERENCES FOR FURTHER READING

ADAMS: *Modern Developments in Educational Practice*, Chapter XII.

BOARD OF EDUCATION: *Handbook of Suggestions*, Chapter V; *Spens Report*.

ALDOUS HUXLEY: *Ends and Means*, Chapter XII.

KEATINGE: *Studies in Education*, Chapter VII.

MACMUNN: *The Child's Path to Freedom*.

NUNN: *Education: its Data and First Principles*, Chapter XV.

RAYMONT: *Modern Education: its Aims and Methods*, Chapter X.

ROUSSEAU: *Emile, or Education*.

SIMPSON: *An Adventure in Education; Sane Schooling*, Chapters I-IV; *Howson of Holt*.

SPENCER: *Essay on Moral Education*.

WELTON: *What do we mean by Education?* Chapter III.

Essay on "Discipline" in *The Assistant Master speaks*.

CHAPTER VIII

INTELLECTUAL DISCIPLINE

WE have seen that the philosophy of naturalism leads to an educational aim of adjustment to environment; pragmatism gives us progress and the creation of human values; while idealism stresses the development of personality and attunement to universal values. None of these philosophies declares that knowledge is the end of education. Yet clearly, adjustment to environment cannot be achieved apart from knowledge of that environment; progress and the creation of values are empty cries unless a fuller knowledge of men and things is sought; the achievement of personality and the appreciation of values are impossible without a growing knowledge of the spiritual universe. Thus, from any approach, knowledge, while not the aim of education, is the indispensable means. From practically all standpoints as regards aim, educators turn to knowledge as the instrument by means of which they achieve their purpose. Knowledge, then, as Adams said,¹ is the educational organon.

The great idealist educators have with one voice proclaimed that education is concerned primarily with character and personality rather than with knowledge. Yet they, as much as the exponents of rival schools of thought, have exalted knowledge as their means. Herbart, for example, declared that the whole aim and purpose of education should be directed towards morality or virtue. But believing, as he did, that the

¹ *Evolution of Educational Theory*, p. 186.

will originates in the circle of thought, he taught that the main business of the educator is to implant ideas. Exalting thus the power of knowledge to produce virtue, he became the arch-instructor; indeed it is his psychological doctrine which has provided the teacher with a technique of instruction of abiding value. For Socrates, that stern moralist, the man who had true knowledge could not be other than virtuous. "No man who either knows or believes that other things are better than that which he is doing, if they are such things as he can do, proceeds to do the less good when he might do the better."¹ That is to say, knowledge is virtue.

Such a dictum does not at once command assent; we can all think of erudite scoundrels and unlettered saints. We feel that St Paul had a better understanding of human frailty when he said: "The good that I would I do not: but the evil which I would not, that I do."² Nowadays we are accustomed to think of virtue as a state of the emotions and the will rather than of the intellect. But we must understand what Socrates meant by 'knowledge.' To have true knowledge, or wisdom, is to possess ideas of universal validity. Those who possess such ideas are philosophers; not only are they able to direct their own lives aright, but also, according to Plato, the disciple and interpreter of Socrates, they are entitled to direct the lives of others. Philosophers, then, should be kings, or the kings and princes of this world should have the spirit and power of philosophy. It is knowledge of how to live that is true knowledge.

Philosophers are "lovers of all true being";⁴ not only do they possess ideas of universal validity, but they love and are possessed by such ideas. In psychological

¹ *Protagoras*, 358.

² *Republic*, V, 473.

³ *Epistle to the Romans*, VII, 19.

⁴ *Ibid.*, VI, 485.

language, we might say that their emotions have become linked to those universal ideas, that they have formed love-sentiments towards them. Thus, in the acquisition of the knowledge which is virtue, disciplining of the emotions and the will is seen to be necessary. True knowledge is the possession of ideals rather than ideas; it is apprehension of values. If by knowledge we mean this—and it is what Socrates meant—then we can agree that knowledge is, in very truth, virtue.

Aristotle, however, warns us not to expect the views of the many always to accord with those of the wise.¹ What is the view of the many on the question of the importance of knowledge? For it might well be suspected that the wise are being biassed in the matter by their own intellectualistic cast of mind; that they are only too prone to believe that human perfection is of an intellectual character, that human progress consists in increase of knowledge, that human greatness is measured by power of thought. Members of the teaching profession regard it as their sacred duty to dispel the mists of ignorance; they do not, as a rule, doubt the value of knowledge, although the more thoughtful among them echo the question of Herbert Spencer: "What knowledge is of most worth?" Their customary bias in favour of knowledge may not, of course, be attributable so much to their wisdom as to the intellectual training they themselves have undergone in order to obtain their professional qualifications. There is, however, remarkable agreement between their views and those of parents who are ambitious for their children. For they too do not doubt the outstanding importance of knowledge, and they wish and expect their children to acquire it at school. They are dis-

¹ *Ethics*, I, 4.

satisfied if no clear answer can be given to the question: "What did you learn to-day?"; and an atmosphere of gloom descends on the home whose youthful members have failed to pass their examinations.

In inquiring more precisely into the place of knowledge in education, we may profitably accept the two-fold analysis of views on the matter given by Adams.¹ Views on the function of knowledge in the educative process tend to crystallize round either the notion of knowledge as nurture or that of knowledge as discipline—the nurture and disciplinary views respectively.

The nurture view of knowledge may be stated quite simply. Knowledge is the food of the mind; we feed the mind with knowledge just as we feed the body with food. It is the common-sense view; and to the minds of unsophisticated educators it would never occur that there might be any other reason for imparting knowledge. Naturalism and pragmatism always tend to this view of knowledge as nurture. Naturalism, with its emphasis on adjustment, stresses the need for the individual to know his environment; hence his mind must be nurtured with knowledge that is useful and relevant to real-life situations. Pragmatism, while it concurs with this emphasis on knowledge of everyday life, supplements such a view. It points out that not only do we adjust ourselves to a static environment; we also seek to control it and adjust it to ourselves, creating better conditions and adding new values. Even more, then, from this more comprehensive standpoint, must the mind be fed by knowledge of the environment. It must be known not only in its physical aspect, but in its social and cultural aspects as well. We have to learn to deal intelligently with all aspects of the world

¹ *Evolution of Educational Theory*, p. 186.

around us, and the acquirement of relevant knowledge is our main means of doing this. Here, then, we have the plain, matter-of-fact reason for maintaining that knowledge is the organon of education.

We note that the nurture view urges that the knowledge we impart should be useful knowledge. An extreme form of it is taken by those who, adopting a very barren 'utility' criterion, advocate that we should cut out everything whose utility is not immediately obvious. It ought not to be difficult, they say, to decide what is useful and what is not in ordinary life. We ought, then, to concentrate on the useful parts of mathematics, science, geography, and so on, and leave out the parts that are useless. But the matter is not so simple as that. Teachers justly reply that it is difficult, if not impossible, to tell in advance what may or may not be useful. A barren 'utility' criterion may well result in mental starvation rather than in mental nurture.

Teachers themselves, however, are much more prone to the opposite extreme. Forgetting that knowledge is merely instrumental and exalting it into an end by itself, they are guilty too often of the information fallacy. Now knowledge must not be confused with mere information, either inside the school or outside. We do not really wish to produce those tiresome children "who are up in dates and floor you with them flat," who know everything and can correct their elders on any point of fact. It is not too much to say that the information fallacy dominated the first half-century of popular education in this country. We have already noted the tremendous belief in intellect that characterized the nineteenth century, and its reflection in educational practice.¹ The aim of the teacher was knowledge, and

¹ See pp. 29, 30.

still more knowledge. Ambitious youths themselves bought 'self-educators' and periodicals such as *Science for All*; having mastered their contents they presented themselves as candidates for certificates at South Kensington, and felt better men when they had won them. Mechanics' Institutes flourished; and the efforts of a Society for the Diffusion of Useful Knowledge were expected to check all social evils and bring about the millennium. Everywhere the schools stressed knowledge of facts; as Adams said, they were knowledge-shops, and teachers were information-mongers. Children learned by rote lists of capes, bays, rivers and their tributaries, the dates of the Kings of England, the constituents of air, and the properties of sponges. One remembers a set of science 'readers' which recorded Socratic dialogues conducted by a well-informed but unbearable youth named Fred, who knew everything, and spent his time cross-questioning his more ignorant companions with the object of assuaging their thirst for more and more information. Facts were learnt and the matter was left there.

One can condemn such processes of cramming and yet concede a point to the middle-aged diehards who themselves underwent an unintelligent training in information, and who complain that their children seem to be very badly informed nowadays on matters of everyday knowledge. For the information fallacy is a perversion of what is, after all, a sound view, namely that knowledge should be nurture. Mere erudition is worthless; but true knowledge is something more than masses of facts. Facts must be capable of functioning; true knowledge is potentiality, a power to do. Knowledge must include practice; the possessor of facts must realize that his facts are relevant to certain situations

and be ready to apply them, knowing 'how', as well as knowing 'what' and 'why.' We go wrong if we think of ideas as the furniture of the mind; it is much sounder to think of them as the mind itself. Pursuing the nurture analogy, we may say that, just as food does not remain something in the body but becomes the body, so do properly assimilated facts become the mind. A mind that is merely crammed with facts is suffering from mental indigestion; tags of information no more enable the mind to function than does undigested food enable the body to function. We must, then, think of ideas as active entities, as the mind's powers to deal with situations: as Herbert Spencer said, "Knowledge is turned into faculty as soon as it is taken in, and forthwith aids in the general function of thinking,"¹ or, as Adams used to paraphrase this dictum, "Fact becomes faculty."² Herbart's doctrine of apperception-masses contains the same view of knowledge in another guise.

This, the true nurture view, is eminently sensible. To sum it up, we may repeat that the mind must be fed and enabled to grow in such a way that it will be fit to cope with the problems it encounters. Mere information does not produce this result. Not all knowledge is capable of functioning in action and thought; not all facts become faculty. But true knowledge that is the organon of education must result in power to understand the world, to be on top of situations that present themselves, or to have a prospect of being so. And the world referred to is not merely the physical world or the world of everyday life; it includes social relationships and cultural activities. True knowledge is the material out of which a resourceful mind is made. Thus the

¹ *Essays in Education* (Everyman Edition), p. 8.

² *Evolution of Educational Theory*, p. 195.

nurture view of knowledge can be broadened sufficiently to satisfy the most ambitious of educators.

In the nurture view the nature of the subject-matter—the food of the mind—is of great importance. It is here that we have a divergence from the disciplinary view, which contends that there is something even more important than the actual knowledge itself, namely its training value, its after-effect on the mind. Knowledge is the educational organon, not chiefly on account of its present or future usefulness in a wide or narrow sense, but because it modifies and influences the very nature of the pupil. So the acquisition of knowledge tends to be regarded as a mental gymnastic. Now bodily gymnastics are exercises which, not directly useful in themselves, develop the body in general. No apostle of physical culture would maintain that there is any need in ordinary life to be able to stand on one's head or walk on one's hands; but he does maintain that his exercises fit the body for anything. By analogy, on the disciplinary view, the systematic imparting of knowledge fits the mind for anything.

Using another metaphor, we may say that the disciplinarians regard knowledge as a whetstone of the mind. A book, published in 1557 and bearing the title *The Whetstone of Witte*, turns out to be a treatise on algebra. This illustrates the view that we are now considering; mathematical knowledge is imparted, not mainly because it is a body of ideas that may be applied to the problems of real life, but because it is a means of quickening the powers of the mind. Socrates declared that "Anyone who has studied geometry is infinitely quicker of apprehension than one who has not studied it";¹ and Plato is said to have excluded from his school

¹ *Republic*, VII, 527.

of philosophy those who were ignorant of geometry. Similarly, under this view, Latin is studied, not because one needs nowadays to know the Latin language in order to have access to the literature of other subjects, but because it has a far-reaching effect on the mind that tackles its difficulties.

The notion that knowledge fulfils in the main a disciplinary function is seen most clearly and emphatically in the formal-training dogma. Here we have an implied reference to an old philosophical distinction between form and content; in the dogma referred to, the form of the mind is emphasized at the expense of its content. Now the form of the mind is conceived of as a bundle of faculties or powers, such as memory, reason, judgment, imagination, observation, and so on. The faculties need training and sharpening, and the task of education, according to the dogma, is to train them so that they are ready for use in any situation. In its most extreme form the dogma declares that what is taught does not matter, so long as material which trains the faculties is selected.

So, as Adams remarked,¹ the whole educational field is marked out into areas of influence. Mathematics trains in accuracy and power of reasoning, while mental arithmetic gives alertness; classics result in clearness of expression and cultivation of taste; history produces judgment; science, observation; while the learning by rote of any material whatsoever has a beneficial all-round effect on memory. Further, just as a whetstone must be hard if it is to be effective, so must school subjects be hard if they are to sharpen the wits. They should be selected because of their difficulty, disagreeableness, and power of producing fatigue.

¹ *Evolution of Educational Theory*, p. 213.

Any that are interesting and pleasant immediately come under suspicion as having no training value. If a boy loves craftwork and hates mathematics, that is an excellent reason why he should be required to spend his time on the latter. T. H. Huxley said that he "could get up an osteological primer so arid, so pedantic in its terminology, so altogether distasteful to the youthful mind" ¹ as to beat all the traditional school subjects in training value—an offer which ought to have been accepted by the extreme formalists of his day.

Such a view of education is hardly tenable. Even if the faculties exist, their identification with school subjects is wholly arbitrary.² The idea of imparting knowledge for any reason other than its own usefulness and desirability never occurred to early educators, and the appearance of such a notion marked a stage of sophistication in educational theory. Adams remarked, somewhat dryly, that it came into prominence when the teaching profession became well established.³ Teachers, usually conservative in their outlook, tend to teach things simply because they have become part of the educational tradition, even when they are no longer clearly relevant to the life that is to be lived. When required to justify their practice, they rationalize their unconscious inertia into the formal-training dogma. Thus Latin, which in the Middle Ages was the key to all knowledge, which at the Renaissance was the means of entering into the life and literature of ancient Rome, and which "down to the first half of the eighteenth century was still to a great extent the language of theology, law, science, and even diplomacy in Western

¹ *Collected Essays*, Vol. III, p. 99.

² *Spens Report*, p. 71.

³ *Evolution of Educational Theory*, p. 227.

Europe,"¹ came to be taught, when such reasons were no longer operative, for its alleged training value.

The dogma is now generally discredited in its extreme form. But, although no informed educationist nowadays pays even lip-service to it, it cannot be said that educational practice has yet entirely freed itself from its shackles. As an educational principle, however, it must be regarded as moribund. How has this come about?

At the end of the last century Adams led the campaign in *The Herbartian Psychology Applied to Education*, attacking the dogma from the angle of common sense. His chapter entitled "Formal Education" constitutes a masterly *reductio ad absurdum* of the notion that it does not matter what is taught so long as wit-sharpening subjects are chosen. If mathematics trains the mental faculties, why is it that we do not give a systematic training in crime to achieve the same desirable end? For "what could call into play more of a boy's faculties than orchard-robbing? . . . Why does not apple-stealing rank with Latin and mathematics as a mental gymnastic?"²

He develops his answer by investigating "the educational value of crime under the most favourable conditions, in one of the best schools,"³ namely that of Fagin in *Oliver Twist*. He supposes that a full inspection has taken place, and pictures Fagin reading the report. The teaching-methods employed are extolled, and special praise is given to the promising pupil-teacher, Mr William Sikes. But in the end "crime as an educational organon is condemned, not because it fails to develop intelligence, but because it develops it in a wrong direction. We cancel Fagin's certificate not

¹ *Spens Report*, p. 4.

² *Herbartian Psychology*, p. 111.

³ *Ibid.*, p. 115.

because he is a bad teacher, but because he teaches bad things."¹

After this it was no longer possible naïvely to maintain that what is taught is immaterial so long as it is hard enough. Clearly the content of instruction does matter; and when we admit that it matters we come back to the nurture view of knowledge. We can poison the mind with bad ideas just as we can poison the body with bad food.

Next the faculty psychology itself, on which the dogma rests, came under suspicion. Although, as Professor Spearman has said, "faculties have a way of losing every battle but always winning the war,"² we must never forget that the mind is one and indivisible, and that therefore no account of it as a bundle of faculties can ever be adequate. Any faculty psychology is bound to be guilty of hypostatization; and faculty psychologists have habitually lost sight of the wood in their study of individual trees. It is clear that any shortcomings of the faculty psychology must spell corresponding defects in the conception of formal education which is based on it.

But the criticism of the faculty psychology went much further than general considerations of this kind. The experimental psychologists entered the arena. If there are such entities as mental faculties which are capable of being trained, they said, improvements in the exercise of a faculty in one particular direction ought to produce an all-round improvement of that faculty. If, then, a person is trained in an activity that exercises a certain faculty, the effects of that training ought to be apparent in another activity that exercises that faculty. For

¹ *Herbartian Psychology*, p. 134.

² *The Abilities of Man*, p. 38.

example, if the memory is trained by the learning of poetry, there ought to be transfer of the effects of the training to the memorization of other material, such as dates or mathematical formulae. Thus the question of transfer of training became an important problem of experimental psychology. James started the ball rolling by experimenting on the training of his own memory. Having given himself daily practice in memorizing *Paradise Lost*, he investigated the effects of the training on his power to memorize Victor Hugo's *Satyr*. Much to his astonishment he found that he could do this no better after the training than before it. This was the first of a long series of experiments which were performed with ever-increasing care and elaboration. Their technique is quite simple in essentials. First of all there is a test of the faculty in material *A*; then there is a training of the faculty by means of material *B*; finally, there is a second test of the faculty in material *A*. If the effects of training by means of material *B* are transferred to material *A*, the amount of transfer is shown by the difference between the scores in the initial and final tests in material *A*.

The results of such experiments on transfer of training have been very largely negative. Sandiford¹ summarizes the findings of experimental psychology as follows:

(1) The transfer effect of training may be negative, zero, or positive. It is usually positive, but the amounts are usually much nearer to zero than to 100 per cent.

(2) If the transfer effect is considerable, it is invariably found that the contents (or methods of presentation) of the testing and training materials have many elements in common.

(3) There is little ground for the belief that the intellect

¹ *Educational Psychology*, p. 293, published 1928.

secures an all-round training from the specific training of any part of it.

Langdon and Yates,¹ however, found no significant transfer of training even when common elements were present. Considering that much previous work had neglected necessary precautions, they took steps to secure adequate motivation throughout their experiments, constancy of motivation in the initial and final tests, and an equal degree of difficulty in the successive tests of transfer. In order to ascertain the amount of improvement actually due to training, they used 'control' subjects who received no training at all; and they satisfied themselves that, in every respect but training, their 'control' subjects were comparable with their trained subjects. Further, both their trained and their 'control' groups were sufficiently large to satisfy statistical criteria. Under such careful conditions the negative result already referred to was obtained.

A subsequent investigation by Cox² was inspired by Myers's distinction between mere 'exercise,' on the one hand, and 'training' which gives 'insight,' on the other. Mere exercise or mechanical practice proved to have little transfer effect; but, when training in knowledge of certain general principles was substituted, a significant amount of transfer was found. The obvious conclusion to be drawn is that transfer of training does not necessarily take place when common elements are present, but that it may occur when there are common methods of dealing with the material in the two situations, and when attention is called to these methods. This is well in

¹ *An Experimental Investigation into Transfer of Training in Skilled Performances*, Brit. Jour. Psych., XVIII, 4 (1928).

² *Some Experiments on Formal Training in the Acquisition of Skill*, Brit. Jour. Psych., XXIV, 1 (1933).

line with the earlier studies of Ruediger, who found that training in neatness in one type of school work was transferred to other types, if "during the exercises in which the specific training was being undertaken, it was attempted, by talks and discussions about neatness in general, to develop an ideal of neatness among the pupils." ¹

It also confirms Bagley's well-known view that the agency of transfer is the ideals that are deliberately fostered and wittingly accepted during the training. "For example, the close thinking that is trained in mathematics may come to function in other fields—in political economy or in psychology or even in the work of practical, everyday life—provided that one has gained from the study of mathematics a certain respect or perhaps even reverence for the rigid, clear-cut mathematical method." ² And in learning any subject whatever the student may form general habits of efficient economical work, which can enter into anything he tackles.

To sum up, if the emotions are linked to the subject of study, that is to say, if sentiments are formed, then we may expect a training-spread. For it is sentiments that constitute our general attitudes to the diverse problems of everyday life, and determine our common methods of dealing with such problems. It is certain, however, that the development of valuable sentiments depends on the student-teacher relationship rather than on the subject of study.

Apart from such qualifications, the negative results of the experiments in mechanical transfer of training must be accepted, and the existence of the traditional

¹ Bagley: *Educational Values*, p. 191.

² *Ibid.*, p. 190.

faculties doubted. It is, after all, in accord with common experience to maintain that a person's memory is not equally good all round; he remembers some things well, others badly, according to his interests. If it be objected that common experience also shows that training in hard subjects, such as classics, mathematics, or philosophy, does seem to produce good all-round minds, it must be rejoined that it needs a good mind to begin with to succeed in these hard studies, and that it is the same good mind that does well in other spheres of activity. Hard training does not produce good minds; rather is it the case that good minds are necessary to succeed in hard training. The root cause of the success is the good mind rather than the training.

But there must be some truth in a conception of intellectual education that has been held so tenaciously by generations of teachers, namely, that certain studies do give mental training of a general character. The discredit that has fallen on the formal-training dogma does not necessarily apply to the main idea of intellectual discipline. There is, indeed, an important truth wrapped up in the very phrase 'formal education.' There can be no doubt that mathematical studies, for example, do produce a form or type of mind that we may fairly call the mathematical mind. Given the requisite native ability, the student who undertakes intensive mathematical studies may eventually come to look at the world in a certain way, the way that is characteristic of the mathematician rather than of the scientist, the historian, the literary man, or the artist. His mind, stored with mathematical concepts, will tend to apply these to the interpretation of the world, not only the physical but also the social world. He has become a mathematician. His mind has assumed a certain shape

or form, that which is typical of all those who not only know but also love mathematics, and which is a direct result of his mathematical education. Mathematics is not only his mental content but also his mental attitude. This view of formal education is sound, and it cannot be disproved by the results of experimental psychology.

The conception of moral discipline developed in the preceding chapter may help us to get the notion of intellectual discipline into its proper perspective. We saw there that discipline of character is the effect produced on immature minds by the influence of more mature minds, and that it comes, in the first instance, as the result of an attitude of discipleship towards an admired personality. Later, this attitude is transferred to the moral giants of the race; finally, the ideals for which the personal educator and these moral giants stand are accepted by the disciple as his own. When they become his own ideals, discipline has become self-discipline and character has been formed. Intellectual discipline is exactly similar, and it is by discipline that the mind assumes a characteristic form. If a boy with mathematical ability admires his mathematics master as a man, he will tend to catch his enthusiasms and copy his sentiments; by sitting at the feet of that master he will become keenly interested in mathematical studies and pursuits. The master, in turn, will damp down his pupil's attitude of dependence on him as a person, and direct his intellectual allegiance to the mathematical giants, or at least to their modes of thinking—but there is decided gain if such allegiance can be a personal attitude of discipleship to the great mathematicians themselves. "To live for a time close to great minds is the best kind of education."¹ By imitating their thoughts

¹ John Buchan: *Memory Hold-the-Door*, p. 35.

the student shares their achievements, and his mind is formed by contact with theirs. In the end he has a love-sentiment towards mathematical studies; his discipleship has resulted in the disciplining of his mind; he has become a freeman of the world of mathematics. "An apprentice striving to learn the trick of the master hand"¹ has become a qualified journeyman. If our student by submitting himself to the "influences of the great tradition,"² by endeavouring "to learn to do fine things in the fine way,"² makes himself, in however small a degree, one with the illustrious line of the great mathematicians, entering into their very skin and seeing the world through their eyes, something of permanent value has been achieved. One who is disciplined in this way will have a drive to continue his studies and extend his knowledge throughout life.

We saw earlier that naturalism and pragmatism support the nurture view of knowledge in education; here we see that the disciplinary view is well in line with idealism, for it is by intellectual discipline as we have described it that the student pursues intellectual values and becomes a freeman of the world of ideas. Although it is undeniable that there is a certain amount of divergence between the two views, it is also clear that there is a large tract of common ground if broad, sane interpretations are accepted. We rejected the information fallacy as a perversion of the nurture view, and saw that true mental nurture consists in fact becoming faculty. We rejected also the formal-training dogma, along with a rigid faculty psychology, as a perversion of the disciplinary view. If, however, the mind is not a bundle of unrelated faculties but an indivisible entity, then it is clear that the effect of any mental training or

¹ Sir T. Percy Nunn.

² *Spens Report*, p. 161.

discipline belongs to the mind as a whole. Ideas, if they are truly ideas, rather than inert mental lumber, not only enrich the whole mind but become the mind. All experience causes the mind to grow; experience of a particular sort makes it grow in a particular way; and the planned experience that we call study enables it to grow systematically. Active ideas are the forms of the mind's reaction to situations. They are its acquired powers, and integrate themselves into wholes which, whether we call them knowledge-systems, mental backgrounds, cognitive dispositions, complexes, or apperception-masses, are powerful determinants of all our activities and attitudes. From the disciplinary standpoint, then, training results in power; fact again becomes faculty. Thus there is no fundamental conflict between knowledge as nurture and knowledge as discipline; they are complementary rather than opposed, and they meet one another in Adams's formula.

REFERENCES FOR FURTHER READING

- ADAMS: *Evolution of Educational Theory*, Chapter VII;
Herbartian Psychology, Chapter V.
BAGLEY: *Educational Values*, Chapter XII.
BOARD OF EDUCATION: *Spens Report*, Appendices IV and V.
T. H. HUXLEY: *Collected Essays*, Vol. III.
NUNN: *Education: its Data and First Principles*, Chapter XV.
PINSENT: *Principles of Teaching-method*, Chapter IX.
RAYMONT: *Modern Education: its Aims and Methods*, Chapter VI.
SANDIFORD: *Educational Psychology*, Chapter XIV.
SLEIGHT: *Educational Values and Methods*.
HERBERT SPENCER: *Essay on Intellectual Education*.

CHAPTER IX

THE CURRICULUM

WE have seen that different philosophies of education, to whatever extent they diverge in other respects, concur in regarding knowledge as the indispensable organon of education. Putting the same point in another way, we may say that they all agree that the school exists in order to provide the child with experience that is deemed to be desirable. We must therefore consider the question of the type of knowledge or experience that the child is to have in school. What principles ought to govern our choice of school studies? How shall we determine the content of the curriculum? To such questions our different philosophies will not supply identical answers. Yet once again we may hope to extract a common factor from the conclusions reached from the different standpoints, and find that to some extent they correct and supplement one another.

Naturalism ① An extreme naturalism concentrates in school on the present experience, activities, and interests of the child himself; it is these and these alone that may legitimately determine what he is to do in school. Let him have his own proper experience, unhampered and unhindered by adult interference, direction, or even coaxing. There is little idea of a goal, beyond that of fostering the growth of a free, active, happy, well-adjusted human being. Emphatically there is no goal of knowledge to be aimed at, for its own sake, as we have already seen in the account of Neill's 'dreadful school.'

no knowledge
goal

But in practice naturalism is usually supplemented and corrected by pragmatism, which gives us at once the utility criterion for the curriculum. The school must store up experience that is to stand the child in good stead. The curriculum must include the knowledge and skills that the child requires, not only for his present life as a child, but also for his future life as an adult. Here we have the common-sense and essentially sound view of the plain man; and if any sophisticated educator considers the opinion of the plain man negligible, he may possibly accept more readily the pronouncement of Aristotle: "There can be no doubt that children should be taught those useful things which are really necessary."¹ "Our attitude towards the curriculum," say the spokesmen of the Board of Education, "has been influenced by a desire to assist children to acquire or develop the habits, skills, interests, and sentiments which they will need both for their own well-being and for that of the people among whom they will live."²

Thus "every normal child must acquire the power of speaking his own language, of reading and writing it, and also some knowledge of arithmetic and measurement. Similarly the importance of health and physical training on the one hand, and of practical instruction on the other, is so great that no one would propose their omission from the curriculum of an Elementary School."³ Here we have a minimum course derived from the utility criterion. These things are essential in everyday life, and one is seriously handicapped without them; therefore they must be included. But the guiding principle of utility gives us, in addition, history and geography, so far as these contribute to an under-

¹ *Politics*, VIII, 2.

² *Handbook of Suggestions*, p. 37.

³ *Ibid.*, pp. 39, 40.

standing of the problems of the everyday life of a citizen, and further mathematics and science, the nature and amount depending on the sort of life the pupil is likely to lead—domestic science for girls, and agricultural science for boys in a farming district, for example. At a later stage, the utility criterion demands direct training for a vocation, a topic which will be dealt with in the following chapter.

Although the educational pragmatist does consider the future mainly in terms of utility, he does not necessarily adopt a narrow, barren interpretation of his principle. For his aim is human progress, and he sees school education as the main means of achieving this. Thus he goes far beyond the naturalist in seeing the need for a certain amount of systematic experience in school; but he whole-heartedly agrees with him in thinking that school studies should be based on the present interests, activities, and experience of the child himself.

Pragmatism Let us see how a pragmatist tackles the problem of the elementary-school curriculum. Dewey stresses the child rather than the book, the subject, or the teacher. If the child is having a rich and full experience now, he is getting the best possible preparation for his future life. Since activity is the essential characteristic of childhood, the child must be active; the experience he undergoes in school must be firmly based on his natural activities and interests. If school experience is of this character, there will be an end of the painful contrast between the keen, alert, small child who eagerly seeks experience, and the older pupil who creeps unwillingly to a school which imposes unwanted experience on him. Dewey enters an emphatic protest against formality in instruction, and he works out to its logical conclusion

the doctrine that learning is an active process rather than a passive acceptance of facts.

He puts forward a fourfold analysis of the natural interests of the child: "the interest in conversation, or communication; in inquiry, or finding out things; in making things, or construction; and in artistic expression." These are "the natural resources, the uninvested capital, upon the exercise of which depends the active growth of the child."¹ Now the arts of reading, writing, and counting are required to follow out these interests, and children desire to master them, not as ends in themselves, but as tools. But while they must ever be subsidiary to the interests themselves, they will surely and inevitably find their proper place.

The problem here is then (1) to furnish the child with a sufficiently large amount of personal activity in occupations, expression, conversation, construction, and experimentation, so that his individuality, moral and intellectual, shall not be swamped by a disproportionate amount of the experience of others to which books introduce him; and (2) so to conduct this more direct experience as to make the child feel the need of resort to and command of the traditional social tools—furnish him with motives and make his recourse to them intelligent, an addition to his powers, instead of a servile dependency. When this problem shall be solved, work in language, literature, and number will not be a combination of mechanical drill, formal analysis, and appeal, even if unconscious, to sensational interests; and there will not be the slightest reason to fear that books and all that relates to them will not take the important place to which they are entitled.²

Thus for Dewey the curriculum is concerned with the realities of child nature and of life. Its content, as

¹ *The School and Society*, p. 147.

² *Ibid.*, pp. 105, 106.

education proceeds, is to be selected from different activities of real life, the determining principle being the natural interests of the child at the successive stages of his development. Many will find this degree of naturalism entirely acceptable. In an ideal home the child learns naturally and inevitably by participating in the home occupations, and, "if we organize and generalize all of this, we have the ideal school."¹ The home is not run entirely in the interests of the child, but the school is for the child alone; thus, from the nature of the case, it can give more systematic training than the home, selecting its occupations entirely from the standpoint of the child's interests.

Idealism Idealism, however, approaches the problem of the curriculum from the domain of ideas rather than from the child and his present or future activities. It concentrates not so much on the present experience of the child as on the experience of the human race as a whole; it considers the rounded whole of human knowledge and experience, and seeks to epitomize it in the school, to bring it to the child. It stands on the position that the purpose of the school is to reflect civilization itself; the main purpose, therefore, of the course of studies is to epitomize and organize, in representative fashion at least, the capitalized experience of the race of which the child is a member. *Summary*

Those who support such a view must proceed with the task of analysing human experience. A preliminary analysis may be obtained from the reflection that man's experience is at least twofold, being concerned with (a) his physical environment, (b) his fellow-men. This gives us at once two broad divisions of the curriculum, (a) the sciences, (b) the humanities, each of which

¹ *The School and Society*, p. 36.

can be subdivided sufficiently to justify almost any given course of studies. The familiar psychological analysis of experience into (a) conation, or the active, striving experience, (b) cognition, or the knowing experience, and (c) affect, or the feeling experience, provides an alternative starting-point. Following it out, we might conclude that school studies must represent (a) what man does, and strives to do. It ought to include the major crafts of mankind, especially those which subserve the fundamental needs of food, clothing, and shelter. These would lead naturally to the use of tools, and to the fine arts that inevitably emerge as practical problems find their solution; for, as Dewey has remarked, "the art of the Renaissance was great because it grew out of the manual arts of life. It did not spring up in a separate atmosphere, however ideal, but carried on to their spiritual meaning processes found in homely and everyday forms of life."¹ The curriculum ought also to comprise (b) what man knows. There must be a representation of his major modes of thinking; thus there must be language and literature, science, mathematics, history, and geography—the traditional intellectual studies, in short. Finally, the school must not fail to provide experience of (c) man's main modes of feeling, and their expression in art, poetry, and music. These are the means by which man has forged the power of expressing his sense of value, and they must on no account be neglected. It was Plato, supreme among the educational idealists, who declared that training "which leads you always to hate what you ought to hate, and love what you ought to love,"² is rightly called education.

Benchara Branford, in a remarkable book *Janus and*

¹ *The School and Society*, p. 77.

² *Laws*, 653.

Vesta, published during the Great War of 1914-18, worked out an analysis comparable with the above. Considering the school to be "an idealized epitome or model of the world, not merely the world of ordinary affairs but the whole of humanity, body and soul, past, present, and future,"¹ he reached a threefold division of man's activities. Since "the head and hand and heart of man" are "a trinity in unity,"² the instruments of culture are likewise three, namely, science, the arts and crafts, and language, including music and literature of all kinds. Man's objects of interest are nature itself, the crafts, and folk; in the school, therefore, we must have (a) nature-craft, or the study of external nature, (b) handicraft, or the study of arts and crafts, (c) language or folk-craft, the study of language in its various forms. Among teachers there must be naturalists, craftsmen, and scholars; or nature-humanists, craft-humanists, and language- or folk-humanists, as Branford terms them, thus crystallizing his view that the teacher must always "be a humanist to develop in his pupils their complete humanity."³

Nunn provides us with a more detailed and therefore more helpful analysis. After accepting the utility criterion as being essentially sound, so far as it goes, and rejecting the formal-training dogma as a determining principle, he develops the idea of intellectual discipline which is outlined in the preceding chapter. For a doctrine of the curriculum he finds solid ground in the position that

A nation's schools . . . are an organ of its life, whose special function is to consolidate its spiritual strength, to maintain its historic continuity, to secure its past

¹ *Janus and Vesta*, p. 145.

² *Ibid.*, p. 129.

³ *Ibid.*, p. 133.

achievements, to guarantee its future. Through its schools a nation should become conscious of the abiding sources from which the best movements in its life have always drawn their inspiration, should come to share the dreams of its nobler sons, should constantly submit itself to self-criticism, should purge its ideals, should re-inform and re-direct its impulses.¹

The school must reflect those human activities "that are of greatest and most permanent significance in the wider world," "the grand expressions of the human spirit."² In Nunn's doctrine, so eloquently stated, we have the essence of the idealist position.

What are those human activities that must be reflected? They "fall naturally into two groups. In the first we place the activities that safeguard the conditions and maintain the standard of individual and social life: such as the care of health and bodily grace, manners, social organization, morals, religion; in the second, the typical creative activities that constitute, so to speak, the solid tissue of civilization."³ "The activities of the first group cannot, from their nature, be treated as 'subjects,' though they should be inspired and nourished by the pupil's studies and must to a varying extent be guided by definite teaching."⁴ Social organization and morals, for example, must pervade the whole life of the school, and the religious spirit should never be absent. Turning to the activities in the second group, we find that

Every complete scheme of education must comprise (i) literature, including at least the best literature of the motherland; (ii) some forms of art, including music, the most universal of the arts; (iii) handicraft, taught

¹ *Education: its Data and First Principles*, p. 233.

² *Ibid.*, p. 242. (See also *Spens Report*, p. 157.)

³ *Ibid.*, p. 242.

⁴ *Ibid.*, p. 243.

with emphasis either on its aesthetic aspect, as in weaving, carving, lettering, or on its constructional aspect, as in carpentry and needlework; (iv) science, including mathematics, the science of number, space, and time. History and geography should appear in it in a double guise. On the one hand, history belongs with literature as geography belongs with science. On the other hand, they should have a central position in the curriculum as the subjects in which the human movement is, as such, presented and interpreted.¹

It will be seen that Nunn's analysis of the creative activities corresponds well with Branford's division of human activities into folk- or language-craft, handicraft and nature-craft.

What should be the spirit of the teaching? Nunn is emphatic that "the school must be thought of primarily not as a place where certain knowledge is learnt, but as a place where the young are disciplined in certain forms of activity."² On similar lines is the pronouncement of the Board of Education, that "the curriculum should be thought of in terms of activity and experience rather than of knowledge to be acquired and facts to be stored."³ Thus, for example, mathematics must not be taught as a set of tricks, but as a characteristic way of thinking and doing, a way of dealing with the world, the way of an Archimedes or a Newton or of any less renowned mathematician. We must not so much give our pupils the results of mathematical thinking as guide them through its processes. What is true of mathematics is true of all school subjects; they must be given the pupil as channels in which his creative energy may flow. We get the matter in proper perspective

¹ *Education: its Data and First Principles*, p. 243.

² *Ibid.*, p. 242.

³ *The Primary School*, p. 93.

when we remember that *poets* are, literally, *makers* or *makaris*, to use the old Scots equivalent. Not only in poetry, then, but in literature generally, in mathematics, science, geography, history, and all school-activities, the pupil is to be a maker, a creator, a doer. Always he is to have the joy of discovery, of creative activity; he is to be satisfied with the travail of his own soul.

Here we reach common ground with the Dewey doctrine, for he, as well as Nunn, asserts that work in school must consist of activities. No doubt for the former it is in the main the child himself who is the determining factor in the selection of activities, whereas for the latter it is the broad view of civilization as a whole that determines the selection. It would be idle to pretend that the two views necessarily lead to identical curricula, although the spirit of the work might be similar. Yet when we read in the pages of Dewey that "there is a sort of natural recurrence of the child mind to the typical activities of primitive peoples,"¹ and reflect that the typical human activities that Nunn would wish to see represented in the early stages of education are just those primitive activities, we may well conclude that there is no fundamental divergence between the two approaches to the problem. It remains true, however, that the one is essentially naturalistic, starting from the standpoint of the child, while the other is idealistic, starting from the rounded whole of human knowledge and achievement.

But both protest against passivity, formalism, and verbalism in education. Many will feel that the Dewey doctrine provides the better safeguard against any neglect of the child himself and his interests, and against an undue division of the curriculum into subjects separated

¹ *The School and Society*, p. 46.

from one another. It pulls the whole process of learning firmly together and integrates the curriculum, the integrating factor being the child himself. As always with educational systems informed by naturalism and pragmatism, the danger seems to lie in the lack of a clear goal towards which effort is to be directed. Children are men and women in the making, and child-activity is therefore not wholly an end in itself. When the last word has been said on the importance and significance of the child's present life, it remains true that education is preparation for something beyond the school. Nunn's idealistic view does give us a goal, if an ambitious one, and there need be no quarrel between it and the pragmatic and naturalistic doctrine of activities, provided these are leading somewhere. But, as we have already seen, idealism inevitably stresses the goal, whereas naturalism stresses the means of education. The idealist will have it that the creation of interests that are not already there is a worthier objective than the exploitation of those that are.

Protests against formalism in education, moreover, themselves need to be safeguarded against too literal an interpretation. We can all agree that, especially in the early stages, formal instruction ought to occupy a place subordinate to the child's own purposive activity. If, however, the child sees the need and experiences the desire for a certain amount of formal instruction in, say, arithmetic or reading, there is every reason why he should receive it. The school ought to distil for him the essence of the experience of the race and provide a store of capitalized knowledge that will be available for future use. However he or she may stress natural activities and interests, the educator is bound to make some analysis of human experience as

a whole, and decide what experiences the child will most profitably undergo in school; and this will always involve a certain amount of division of the curriculum into activities that are more or less separate from one another. But let it be reiterated that such activities must always be purposive; the child should make a direct attack on a problem and realize for himself that it is essential to extend his knowledge and skill. The wise teacher sees to it that his pupil does encounter difficulties that only the learning of reading or arithmetic will solve. It is necessary only to guard against the notion of education as a long process of preparation, devoid of all meaning for the young person undergoing it.

No doubt many educators who labour in schools where pupils of high intellectual calibre are the exception rather than the rule will say with a sigh that Nunn's vision is beautiful, but impossibly idealistic. With pupils of mediocre capacity they may well decide that the ideal goal of the curriculum, namely, the epitomizing of the best and most worthy achievements of the human spirit, cannot be achieved. We can understand that, in their quest for reform in curriculum and method, they are inclined to apply the Dewey principle as being more within reach. But the *Spens Report* reminds such teachers that a well-rounded education does involve some degree of contact with all the great cultural traditions, although not necessarily contact with all at every stage.¹ Nunn's goal is the ideal to aim at, and, even though attainment cannot be complete, a partial success may be possible. Something of great value has been achieved, after all, if even one characteristic realm of man's thought has been entered by a youth or

¹ P. 158.

maiden who, with no high degree of general ability, has an *ingenium* for that type of thought. Even if our pupil lacks *ingenium* for certain particular cultural traditions, courses may be organized, from which "arid technique" and "excess of detail" are absent, and which "bring out the essential characters of those modes of creative activity and illustrate the part they play in the business of mankind."¹ While "no human being can attain to anything but fragmentary knowledge and a fragmentary training of his capacities,"² it is worth remembering that a person can have the mathematical or scientific spirit, for example, without an extensive knowledge of mathematics or science.

Even under the most favourable conditions Nunn's goal needs, for its attainment, a long and arduous educative process which must be based on successive stages of development. We might profitably consider the nature of these stages before leaving the topic of the curriculum. In two remarkable addresses³ Professor A. N. Whitehead developed the idea that learning has a natural threefold rhythm, whose successive phases are 'romance,' 'precision,' and 'generalization'; and he urged that intellectual education, whether it is considered as a whole, or as separate subjects, or as single topics within a subject, must be based on this rhythm. In the first stage of romance, "knowledge is not dominated by systematic procedure";⁴ rather is the mind of the learner stirred into a ferment by the wonder of things, indulging in "a somewhat discursive activity amid a welter of ideas and experience."⁵ When the initial impetus of wonder has spent itself,

¹ *Spens Report*, p. 158.

² Whitehead: *The Aims of Education*, p. 84.

³ *The Rhythm of Education*, and *The Rhythmic Claims of Freedom and Discipline*, published in *The Aims of Education*.

⁴ *Op. cit.*, p. 28.

⁵ *Ibid.*, p. 50.

the stage of precision naturally follows. Then the drive is towards exact formulation, getting facts straight, extending knowledge and skill. Last of all, at the adolescent period, comes the desire for generalization, that final phase of the rhythm, in which broad principles and wide views are sought, the learner wishing to see things steadily and see them whole. "Full adolescence is, indeed, the epoch of life at which an intelligent boy or girl first feels the attraction of great generalizations and of views and speculations which seek to bring all time and existence within their scope."¹

The broad sweep of the development of scientific knowledge, both in the race and in the individual, is a striking example of this rhythm. Science begins in wonder—wonder about the universe, romantic speculation as to its nature and meaning. Only gradually is it realized that something more than curiosity is required to make the universe yield up its secrets and that the arduous task of getting and verifying facts by precise, exact observation and experiment has to be undertaken. Not until such facts become reasonably certain is it possible to formulate the great generalizations that we call scientific laws.

Our confidence in the soundness of Whitehead's law of rhythm is increased by the fact that Nunn independently reached the conclusion that the learning process has a natural, threefold periodicity of wonder, utility, and system, and that teaching-procedure must observe these stages.² It is unnecessary to show that his 'wonder' and 'system' are, respectively, merely different names for Whitehead's 'romance' and 'generalization';

¹ *Spens Report*, p. 164.

² *Education: its Data and First Principles*, p. 248. See also *Spens Report*, pp. 162-164.

and it will readily be granted that 'precision' and 'utility' are but different ways of looking at the same thing. 'Utility' suggests that the learner's interest is now concentrated on the practical application of ideas, on their usefulness in human affairs. But it is just this interest that constitutes a powerful motive to obtain precise knowledge; for if knowledge is to be soundly applied it must be exact.

From time to time attempts have been made to formulate a general method of education which would be applicable no matter what the subject of instruction might be. All trained teachers are familiar, for example, with the Herbartian steps based on the doctrine of apperception, with the heuristic method which seeks to put the child in the position of the discoverer, and with the recapitulative method by which he learns as the race learned. But in the progression of wonder to precision and utility, and of these, in turn, to system we seem to have a generalization more far-reaching than any of its predecessors. None of the stages may be neglected if knowledge is to become true knowledge. Wonder and curiosity supply the emotional drive which sustains the effort to obtain clear ideas that may be exactly applied in particular cases. But the final stage must always be the possession of broad, general ideas that are the mind's power of dealing with any situation that may present itself.

History, for instance, as is generally agreed, should begin with tales and legends about people. These should, in due course, be superseded by a more exact inquiry into what really did happen; details should be sorted out and some precise historical knowledge obtained, especially such as will contribute to an understanding of the present. But the ultimate goal of

historical studies ought always to be an understanding of broad movements in the affairs of peoples, which enables its possessor to see the perplexing world of to-day in its proper perspective. Examples might be multiplied from other subjects, but their working-out will provide a profitable exercise for the reader, especially if he is, or is likely to be, a specialist teacher.

If we realize that in the Whitehead-Nunn rhythm we have the natural stages of intellectual development, and, above all, if we grasp the fundamental point that system is the goal rather than the process of intellectual education, we shall avoid the pitfalls of our own academic training and resist the temptation to give prematurely systematic presentations of subject-matter to young pupils. Further, we may realize that, with a given type of pupil, or in a given type of school, it may perhaps be possible to travel only a certain length along the road that has been indicated. With all pupils the stage of wonder is essential, also the amount of precision necessary to ensure utility. But it may be conceded that any considerable amount of system or generalization may be attainable only by the more intellectually able of our pupils.

REFERENCES FOR FURTHER READING

BRANFORD: *Janus and Vesta*, Chapter IX.

BOARD OF EDUCATION: *Handbook of Suggestions*, Chapter VII; *Spens Report*, Chapters I, IV, and VI, Appendices II and III; *Hadow Report*, Chapter IV, pp. 189-247; *The Primary School*, Chapter VII, pp. 150-206.

DAVIS: *The Matter and Method of Modern Teaching*.

DEWEY: *The School and Society*.

FINDLAY: *The Foundations of Education*, Vol. II, Chapter II.

KEATINGE: *Studies in Education*, Chapter VI.

NUNN: *Education: its Data and First Principles*, Chapter XV.

RAYMONT: *Modern Education: its Aims and Methods*, Chapters VI and VII.

WATTS: *Education for Self-Realization and Social Service*, Part III, Chapters VII and VIII.

WHEELER: *Creative Education and the Future*, Chapters XVIII and XIX.

WHITEHEAD: *The Aims of Education*.

CHAPTER X

REALISM IN EDUCATION

IN our discussion of the philosophical problem we referred to the doctrine of realism, which asserts that there is a real world of things behind and corresponding to the objects of our perception. In line with this trend of thought there is a realistic movement in educational theory and practice. Just as naturalism comes on the educational scene as a protest against systems of training that have become artificial, so realism tends to appear as a reaction against curricula consisting of studies that have become bookish, sophisticated, and abstruse. Every now and then the educator is enjoined to abandon his abstractions and concentrate on realities.

This constant reappearance of a realistic doctrine might be exemplified from various periods in the history of education, but one or two instances must suffice. After the enthusiasm of the Renaissance had spent itself, and the classical studies inspired by it had degenerated into mere pedantry and grammar-grinding, there was a wave of realism in educational theory, if not in educational practice. The social realists, looking askance at bookish studies, stressed the value of direct studies of men and things; having in mind chiefly the upper classes, they advocated a period of travel, a *grand tour*, which would give real experience of the varied aspects of life. Sense realism, the educational reflex of the seventeenth-century interest in science, took as its fundamental tenet the belief that all knowledge comes

through the senses. With their cry *Nihil in intellectu quod non prius in sensu*, the sense-realists regarded as of fundamental importance in education the natural phenomena of which the senses give us first-hand knowledge; they therefore sought to displace literary and linguistic by scientific studies, that is to say, studies of real things by the inductive method.

The latter movement reached a climax in the nineteenth century. In an age of outstanding scientific achievement it was entirely natural and reasonable to urge the claim of science to provide the educative material most suitable for life. Thus Herbert Spencer and Thomas Henry Huxley were eloquent and persuasive defenders of scientific education. Spencer, to his own question: "What knowledge is of most worth?" had no difficulty in providing the answer that scientific studies are of much greater value than linguistic studies; that "whether for intellectual, moral, or religious training, the study of surrounding phenomena is immensely superior to the study of grammars and lexicons."¹ His great contemporary, Huxley, pleaded with even greater eloquence for the introduction into all schools of "a complete and thorough scientific culture"² which should be commenced "with the dawn of intelligence."³ This vigorous thinker is one of the most typical as well as one of the sanest of realists in the emphasis he puts on the study of men and things as they are, and as they are likely to be encountered in life.

An extreme realism, however, deprecates the value of books and adopts the slogan "Things rather than words" as its battle-cry.⁴ Now while we must listen with all due respect to any reasoned protest against

¹ *Essays on Education* (Everyman Edition), p. 42.

² *Collected Essays*, Vol. III, p. 122. ³ *Ibid.*, p. 128.

⁴ See p. 100.

mere verbalism in education, we can hardly accept the antithesis between things and words that is implied here. Words are symbols for things, and their use is indispensable for mental development; thought without language must always be of a rudimentary character. It must therefore be wrong to try to exclude words from education. Language enables us to deal with things more economically than by actual manipulation of these things, just as civilized peoples use money instead of bartering actual goods. There is no sound classification of studies into verbal, on the one hand, and real, on the other, the former dealing with words, the latter with real things. No doubt some subjects are dealt with most appropriately through talk and books, and others demand the seeing and handling of actual material. But while we must make it our business to see that the former do not lose contact with reality, we must also reflect that the latter cannot make headway without the adoption and use of an appropriate language. So-called verbal and real studies are complementary rather than opposed. It might well be added that the real studies are themselves quite capable, in their turn, of degenerating into a jargon of words and symbols that merits the worst strictures of the realists.

What is the position to-day? After seventy years of popular education our curricula have become sophisticated and the voice of the realist is again heard in the land. In the recent *Report of the Consultative Committee on Secondary Education*¹ we have an informed and authoritative expression of the general dissatisfaction with the work of the schools. This careful study of the present position has led to the belief "that the existing arrangements for the whole-time education of boys and

¹ *Spens Report.*

girls above the age of 11+ in England and Wales have ceased to correspond with the actual structure of modern society and with the economic facts of the situation."¹ It follows out the consequences of its realistic standpoint and indicates clearly the way of reform in educational administration and practice.

Thus to-day, as always before, the realist enters his emphatic protest against a cleavage between the work of the school and the life of the world outside it. He becomes indignant at the professional attitude of teachers who seem to deny, implicitly if not explicitly, the value of school activities that cannot be systematically formulated in text-books, and lessons which the pupil must study and learn with a view to regurgitating his ill-gotten knowledge in public examinations. We would do well to hear his cry and accept his protest, even if we maintain the value of many of the traditional school studies and of as systematic a treatment of them as is possible in given circumstances.

Contemporary events should find a place in our study of history, and the effort should be made to understand them in the light of relevant past events; the study of civics should be included, and the social organization of the school should be regarded as an important means of giving practical training in citizenship. And if the history specialist rejoins that this is not history, the non-specialist may well reply that it is something of much greater value than the usual academic historical studies. Mathematics, in turn, must aim primarily at an understanding of the world in its numerical and spatial aspects; mathematical studies, instead of being a juggling with imperfectly understood symbols, should forge a tool that enables its possessor to deal intelligently

¹ *Spens Report*, p. xxii.

with things in the mathematical way. Literature, always "a criticism of life," must include present-day literature, and its study must result in the pupil's realization of literature as a living, growing thing. Especially in an age whose output of books finds no parallel in former times it is of the utmost importance that young people should develop the power of coping with a flood of literature, of selecting intelligently and reading to good purpose.

Science itself, almost as readily as any other school-subject, can degenerate into a formal unreality; far too often it becomes a mechanical routine of experiments whose import in life fails to be grasped by the pupil. Applications must be clearly brought out; indeed there is much to be said for the method of teaching which starts with applications and proceeds to principles instead of following the reverse order. It may also be said that school science is all too frequently quite out of touch with modern science; boys may have had intensive sixth-form work in science and yet leave school knowing little or nothing of twentieth-century scientific thought. This can easily be remedied by the provision of simple lectures on electrons, spiral nebulae, relativity, and other topics: here the teacher of science should not hesitate to go beyond the strictly experimental method and resort to verbal description and explanation. Such lectures are highly successful in the hands of those who not only are conversant with the topics discussed, but who also understand the adolescent mind and its desire to reach the heart of things.

Thus all special studies in school should keep well in touch with those aspects of the outside world of which they are a reflex. A realistic doctrine in education is a perpetual challenge to the teacher to keep thinking not only about his methods of teaching but

also about the value and significance of its content; and a sane realism is well worthy of acceptance as one of the criteria of value that may reasonably be applied to the work of the school.

The cry for realism often takes the specific form of a demand that education should be directed towards a particular calling in life, that is to say, that it should be vocational in character. Such a demand frequently finds an echo in the mind of the adolescent, who has normally a strong desire to lay hold on the realities of life and definitely to prepare for a career. In his eyes education gains greatly in value if it is directed towards a clearly envisaged goal. Few nowadays would deny that training with so strong an incentive behind it can have educational effects that are as beneficial as they are far-reaching. Plato, however, exalting the life of contemplation, regarded the manual arts as vulgar; and perhaps it is his authority that is the explanation of a bias against vocational training on account of its alleged failure to provide an education that is general, liberal, and humane. In the notions of generality, liberality, and humanity we have the traditional criteria of cultural values in education. Let us examine them in turn as a first step towards clearing up our ideas on the matter.

As the *Spens Report* says, 'general education' "is one of those question-begging phrases which are so frequently used when speaking of education, the meaning of which only becomes definite when the aims of education have been formulated. It may mean a curriculum which includes a wide range of subjects as opposed to the study of one or two different branches of learning. It may mean a training which is considered suitable for every future occupation as opposed to a training which specifically prepares for a single

calling. It may mean a training that aims at the development in the pupil of certain attributes, habits, skills, sentiments, and attitudes of mind; as well as the possession and use of knowledge. It may mean all of these."¹ Perhaps the second of these meanings is the commonest; those who employ the term usually have in mind a training that is not directed towards any particular goal, but rather one that fits the pupil for any walk in life. Thus Milton declared: "I call therefore a compleat and generous Education that which fits a man to perform justly, skilfully, and magnanimously all the offices both private and publick of Peace and War,"² while Rousseau cried: "Life is the trade I would teach him."³

But is such a high degree of generality possible? Is not any scheme of education specific in that it tends to produce a particular type of man? Adams said that when we look into the aims of Milton we see that he wanted to produce "a body of country squires who would have all the sturdiness that the commonwealth squires certainly possessed, joined with a culture as profound as would be consistent with the efficient discharge of their duties as officers in the army of the Parliament."⁴ Thus the *Tractate* deals not with the education of men in general but with that of a specific type of man. Adams added: "No visualizer can read Rousseau without making a picture of the finished Emile as a French dandy with sky blue coat, cocked hat, ruffled sleeves, knee-breeches, and a ceremonial sword. No doubt Jean Jacques would invite us to make this picture stand for one of nature's gentlemen, but the reader will have his doubts, and will in any case know that Emile is obviously being educated for a

¹ *Spens Report*, p. 141.
Edition), p. 9.

² *Tractate on Education*. ³ *Emile* (Everyman Edition), p. 9.
⁴ *Evolution of Educational Theory*, p. 177.

very definite rank in society.”¹ In like manner it is demonstrable that all who have written on an ideal general education have had in view a finished product of a specific character. Probably the nearest approach in theory and practice to a general education was the attempt to give all-round training of the mental faculties; but of this we have already seen the fallacies. Until recent times the Arts course at a Scottish university constituted an attempt to provide general training, embracing in its scope linguistic, mathematical, scientific, and philosophical studies; but again the Arts graduate was a specific type of person.

It is worthy of note that early education was definitely a specific, *ad hoc* process. Training in oratory was fashionable in ancient times; it was offered by the sophists, its importance was emphasized by Cicero, and its principles and methods were given explicit formulation by Quintilian. Plato, in *The Republic*, described the ideal training for artisans, soldiers, and philosopher-kings respectively. In the Middle Ages young people were prepared directly to be cobblers, glovers, merchants, priests, or very perfect, gentle knights. At a later stage the courtly academies on the Continent served the needs of the governing classes, receiving young members of the English upper classes for a training that would fit them for posts at court, in diplomacy, or in the army.² And in England, during the latter part of the seventeenth century and at the beginning of the eighteenth, mathematical schools were founded in coast towns to give a training in mathematics, geography, and navigation suitable for captains and officers of the mercantile marine.³

¹ *Evolution of Educational Theory*, p. 178.

² *Spens Report*, pp. 9, 10.

³ *Ibid.*, pp. 10, 11.

Where there is little or no theory a specific rather than a general training is indicated by common sense. It was educational theory rather than educational practice that evolved the notion of general education, a notion which, as we have seen, will not bear strict examination. Since all so-called general education is really specific in character, it is clear that generality cannot be taken as a fair criterion of cultural values in education. Vocational education, moreover, is itself a form of specific education. In a wide sense, indeed, the two terms might be regarded as equivalent; but it is useful, as Adams suggested, to apply the word 'specific' to the wider training that produces a certain type of man and reserve the word 'vocational' for the narrower and more specialized training that relates directly to the occupation the educand is to follow. Specialization in science at a university, since it produces a scientific man, provides an example of specific education; but specialization in engineering is vocational education. Not all specific education is vocational, but all vocational education is specific. Since vocational and so-called general education are both in reality specific education, we have not yet found a means of deciding whether or not the former can include culture in its scope.

The word 'liberal' as applied to education is not derived, as was at one time supposed, from *liber*, meaning 'book,' but from *liber*, meaning 'free.' Thus in its origin liberal education did not necessarily consist of bookish studies, but rather of the studies worthy of a free man, as distinct from the trades and skills necessary for slaves and those without political rights; it was an education that would fit a free man, in body and in soul, for the practice or exercise of virtue, one that would render him capable of profiting by his status. The concept of

liberal education was first formulated by the Greeks at a time when, perhaps as never before, individual development was regarded as desirable, and opportunity was afforded for achieving it. To live happily and beautifully was the aim. This idea of a liberal education as studies that are "fine and worthy of free men"¹ came to fruition in the golden age of Greece, and found its reasoned formulation in the writings of Plato and Aristotle.

We note in passing the implied distinction between culture and utility, and we see that while it is "often thought to be intrinsic and absolute, it is really historical and social. It originated, so far as conscious formulation is concerned, in Greece, and was based upon the fact that the truly human life was lived only by a few who subsisted upon the results of the labour of others."² Hence it is that we have the "division between a liberal education, having to do with the self-sufficing life of leisure devoted to knowing for its own sake, and a useful, practical training for mechanical occupations, devoid of intellectual and aesthetic content."²

In the Middle Ages the notion of a liberal or complete education was conceived of as the study of the Seven Liberal Arts, which were supposed to be inclusive of all learning. Probably the number seven made a special appeal to the medieval ecclesiastics. The *Trivium*, or *artes sermocinales*, consisted of grammar, rhetoric, and dialectic; it was followed by the *Quadrivium* of arithmetic, geometry, music, and astronomy, which were the *artes reales vel physicae*. It is well to remember that these terms bore a somewhat wider meaning than they do to-day; grammar comprised literature, rhetoric included history, and geometry the rudiments of

¹ Aristotle: *Politics*, 3.

² Dewey: *Democracy and Education*, p. 305.

geography. The graduate of the medieval university earned the proud title of *Artium Liberalium Magister*, a title which is still the official designation of a full graduate in Arts at the older universities. We have another survival of the Liberal Arts in the title "Professor of Rhetoric" given to the professor of English Language and Literature at a Scottish university. It is also worthy of mention that the conception of the Seven Liberal Arts as being inclusive of all learning survives in the representative character of the Arts degree given by the University of St Andrews. As a basis for graduation in Arts a student must read at least five subjects, including (a) Latin or Greek or an alternative subject recommended by the Adviser of Studies and the Faculty of Arts, and approved by the Senatus; (b) philosophy or mathematics; (c) at least two and not more than three linguistic subjects; (d) at least one and not more than two scientific subjects. At this ancient seat of learning, education in the liberal arts, if it has had to abandon the goal of complete knowledge, has at least held to the worthy ideal of introducing the student to a representative sample of human culture. It is to be deplored that in so many quarters this ideal has been abandoned in favour of premature specialization.

The old notion of a liberal education as one which brings freedom in its train is much too valuable to be relegated to history. Huxley rose far above the classics *versus* science controversy of his day when he declared:

That man, I think, has had a liberal education who has been so trained in youth that his body is the ready servant of his will, and does with ease and pleasure all the work that, as a mechanism, it is capable of; whose intellect is a clear, cold, logic engine, with all its parts of equal strength, and in smooth working order; ready, like a

steam engine, to be turned to any kind of work, and spin the gossamers as well as forge the anchors of the mind; whose mind is stored with a knowledge of the great and fundamental truths of Nature and of the laws of her operations; one who, no stunted ascetic, is full of life and fire, but whose passions are trained to come to heel by a vigorous will, the servant of a tender conscience; who has learned to love all beauty, whether of Nature or of art, to hate all vileness, and to respect others as himself.

Such an one and no other, I conceive, has had a liberal education; for he is, as completely as a man can be, in harmony with Nature. He will make the best of her, and she of him. They will get on together rarely: she as his ever beneficent mother; he as her mouthpiece, her conscious self, her minister and interpreter.¹

Throughout this classical statement we have the ideal of the highest freedom held up as the result desired of education. We may accept it in detail, and agree that education fails if it does not enable a man to achieve freedom in every way. He must be freed from bondage to the propensities he has inherited from pre-human ancestors. The man with no will-power who has perforce to follow the promptings of any and every primitive impulse is a slave; no doubt he may think himself free from moral conventions, but he is in chains. As we have seen, the only true freedom is self-discipline. A man so freed is free to use the finer intellectual and emotional energies of his mind; he is in a position to qualify as a freeman of the universes of truth, beauty, and goodness. For this he must also have economic freedom; he ought not to have to devote all his energies to obtaining the means of subsistence, but have a surplus to devote to the untrammelled pursuit of the highest things in life. It may well be added, in these days of

¹ *Collected Essays*, Vol. III, p. 86.

newspaper propaganda, catchwords, and slogans, that the hall-mark of a man who has had a liberal education is freedom from the fetters of ignorance, prejudice, and obsession, freedom to think independently. The *Spens Report* supplies a worthy conception of liberal education as one which enables "men and women to understand the world in which they live and to contribute to the understanding of its problems."¹

Humanity as a criterion of value in education is specially associated with the Renaissance, which had, as one of its most important aspects, the enthusiastic study of the newly discovered classical literatures. The life of the ancients was found to have been broad and spacious, and the study of the literature that was a criticism and an evaluation of that life was, therefore, a study of humanity itself, of human life at its best. Such a study of a fine form of life was considered, at the Renaissance, to be more helpful than a direct study of the life of the day and to provide a safer guide to the solution of its problems. It should be realized that the study of the classical literatures was thus only a means towards the end of promoting a finer humanity. The name 'humanity' became current because the true subject of study was man himself; a humanist was a student of man. The proper defence of classical studies at any time is the contention that they provide "a living, breathing universe," not given in like degree by the mastery of other literatures which "do not furnish the same totality of life—a complete world recognizable as such, a humane world, yet one untouchable by decay and death."² Certainly in its origin humanism was emphatically a doctrine of realism; it was only a pedantic, degraded humanism that ever lost touch with reality.

¹ P. xxxi.

² John Buchan: *Memory Hold-the-Door*, p. 36.

It is for this historical reason that the Oxford school of classical 'Greats' bears the title of *Literæ Humaniores*. Similarly the somewhat arrogant title of 'Humanity,' emblazoned on the door of the lecture-room at Edinburgh University devoted to the study of Latin, is the survival of a worthy ideal.

Like the notion of a liberal education, that of humanity is worthy of preservation; it may be used as a descriptive label for the education that deals with man himself. To that extent the doctrine which we developed in the last chapter, namely, that the curriculum should embody and epitomize the worthiest and best achievements of the human spirit, is humanistic. We cannot afford to lose sight of such an ideal, especially at a time when civilization itself is in peril.

We may now inquire whether an education that is directed primarily towards a particular vocation can be cultural, in the sense of bringing freedom and humanity in its train. Is there any real antithesis between vocational and liberal education?

The *Spens Report* reminds us that grammar-school training was, to begin with, vocational in so far as it was the preliminary training necessary for the learned professions.¹ Thus grammar schools were, from one point of view, vocational schools orientated towards the universities; their scholars would in due course enter one of the three ancient learned professions—the church, the law, and medicine—or that of teaching.² It was only by a later development that this direct training for the liberal professions, and especially the training in classics, came to be regarded as a 'general, liberal education.' In the sixteenth and seventeenth centuries there was no clear-cut distinction between

¹ P. xxxi.

² P. 6.

grammar-school education and the contemporary system of apprenticeship.¹ It was the 1904 *Regulations for Secondary Schools*, following the tradition of grammar and public schools, that did harm by divorcing the concept of general from that of technical education, although the general education was itself in reality vocational education for the learned professions; and these regulations must bear their due share of the blame for fostering an unnecessary and unreal distinction between general and technical education.²

Having seen that historical considerations fail to support the contention that vocational education cannot be liberal in its scope, we may remark further that an education that fails to produce a man capable of earning his own living and pulling his weight as a member of society can hardly be called liberal. A man who is dependent on the efforts of others without making an equivalent contribution of his own is not free; he begins to be free only when he is economically independent. Thus far has vocational education a liberalizing effect. But does training for a specific vocation necessarily bring humanity and the wider freedom in its wake?

Whitehead remarks:

The antithesis between a technical education and a liberal education is fallacious. There can be no adequate technical education which is not liberal, and no liberal education which is not technical; that is, no education which does not impart both technique and intellectual vision.³

We note that for Whitehead the technical education must be adequate. The *Spens Report*⁴ draws an important distinction between trade schools which prepare for single and definite vocations such as

¹ *Spens Report*, p. 7.

² *Aims of Education*, p. 74.

³ *Ibid.*, pp. 66, 67.

⁴ Pp. xxvi, xxvii, 84.

printing, dressmaking, laundry work, and waiting, and those which can and do prepare for a considerable variety of vocations. It considers that the latter, for example the junior technical schools based on the engineering and building industries, are capable of providing a form of liberal secondary education alternative to that of the grammar schools. All depends on the nature of the vocation for which training is being given, whether it demands prolonged training of a broad and comprehensive character, or merely the acquirement of a few mechanical skills.

It will probably be agreed that the education of a future teacher can and ought to approach the ideal of humanity, while the specific training necessary for a machine tender, tram driver, or railway porter cannot. For to be a good teacher one must be a humanist, cultured in every sense, intellectually, morally, and spiritually. All such humanistic culture has direct bearing on the work of the teacher. He is indeed fortunate in that his studies, although specially useful in his employment, are at the same time suited to the general cultivation of his mind, and that therefore there is a double reason for giving him cultural education. But the machine tender is less fortunate in that the efficient discharge of his daily duties requires no such culture.

There are a number of occupations—those of the engineer, the cabinet-maker, the builder, the farmer are instances—which meet no trivial or transient needs. They have long filled an essential place in the life of civilized peoples, have a characteristic ethical tradition, have nursed fine characters, and given scope to originating minds and great practical powers. They cannot be worthily carried on without scientific knowledge or trained artistic sensibility. To school a boy in any of these

ancient occupations is to ensure (if it suits his *ingenium*) that he will throw himself into his work with spirit, and derive from it a definite organization of mind and character. There are, in fact, minds whose energies are released only by studies which have the directly envisaged goal of a vocational training. In such cases the vocational education is in the fullest sense also liberal.¹

Whether or not humanity and culture can be found in vocational training depends upon the relation of the vocation in question to the whole of life. If a man's occupation can be the core of his whole being, adequate training for it will be cultural, humane, and liberal. Then we have an ideal state of things in which realistic and cultural education interpenetrate each other easily and naturally, being not two processes but one. In bygone days they must frequently have been combined without either the educator or the educand being aware of a double aspect in the training. We look with wistful admiration at the delightful picture of Hans Sachs and his apprentice David in Wagner's *Mastersingers*, where the cobbler-poet made it his business to instruct his pupil not only in the art of making a fine pair of shoes, but also in music, poetry, and morals. There the master-craftsman, himself a man of culture, took the whole education of his apprentice in hand.

The system of craft-apprenticeship, which gave technical education down to the beginning of the nineteenth century, was broken up by the Industrial Revolution.² The introduction of machinery rendered craftsmanship largely superfluous; moreover the master of a large factory could not give his personal attention to the training of apprentices even if he had wished to do so. We may sigh for the days when a man could

¹ *Spens Report*, pp. 161, 162.

² *Ibid.*, p. 50.

find scope for his creative energies in making a fine pair of boots, but we have to face the regrettable fact that in this age of mass production the majority of our fellow creatures make their living by machine tending, with no opportunity for culture or creative work in their daily occupations. All the more must we, because of their soul-deadening tasks, provide them with cultural pursuits; further, it is clear that the cultural aspect of their education must, from the nature of the case, be separate from the very scanty training their occupations require. Hence it is that we have the cry to-day for education for leisure. However much we may regret the tyranny of machines we may at least partially console ourselves by reflecting on the inevitable shortening of hours of toil which they must bring, leaving the worker time to live after the means of livelihood have been obtained. The notion of education for leisure is as old as Aristotle, but the leisure he had in mind was, as we have seen, the life of contemplation made possible for the few through the slave labour of the many. In a democratic society, however, leisure must be "a reward of accepting responsibility for service, rather than a state of exemption from it."¹ Thus in our own country a major task of education must be to instil the culture and skills that will enable men and women in their leisure time to have the joy of creative activity, and provide a dignified alternative to their resorting, *faute de mieux*, to the public house, or the dirt track, or the sensational cinema.

Although we are reluctant to have to admit that in the case of the majority of the population cultural and vocational education cannot be combined, we must remember that in such cases the energies of the pupil

¹ Dewey: *Democracy and Education*, p. 305.

are not absorbed by arduous vocational training and that they are therefore available for cultural pursuits. We must also reflect that "the art of living is itself a vocation and needs a training as specific as that for any of the recognized modes of earning a livelihood,"¹ "that efficiency is too dearly bought at the price of complete manhood,"² and that we ought not to "sacrifice all that makes life worth living in order to get means to live."² If, then, most of our pupils are doomed to be machine tenders, there is all the more reason why the cultural should bulk largely in our schools. But the culture must be that which relates to present-day life. The old notion of general education, more or less divorced from life, has gone. We are formulating clearer ideas of what we are trying to do; that is to say, we are returning to specific education. "We have in fact boxed the compass in our passage from the old specific education of the prehistoric times to the new specific education of the present."³ Specific education suited the needs of a society more simple than ours; a specific education that suits the needs of the more complex society of to-day must be forged by the present generation of educators. Training must relate more specifically to the sort of life that is likely to be followed, and, if livelihood is to be won by machine tending, then emphatically must it look forward to leisure.

Our conclusion is that, wherever possible, we wish cultural and vocational aspects of education to be combined; where that is impossible we wish the cultural to exist side by side with the amount of vocational training that is necessary, for if culture is unnecessary for vocation it is necessary for leisure. In short, we

¹ Adams: *Evolution of Educational Theory*, p. 243.

² *Ibid.*, p. 244.

³ *Ibid.*, p. 224.

must "see to it that no individual shall be obliged to choose between an education without a vocation and a vocation without an education."¹ Schools that prepare for particular vocations may not neglect cultural education, and schools that regard culture as their main business must not have a soul above vocational considerations. Trade schools which, from the nature of their limited objective, concentrate on a narrow range of particular skills need not come under condemnation from an educational standpoint if provision for a measure of cultural education is made. But the *Spens Report* gives voice to widespread opinion when it recommends that while "preparation for a vocation is an important part of education . . . any specialized training of a vocational character should come towards the end of school life."² It is in accordance with this view that our new senior schools are not vocational in their scope, but rather follow the cautious but realistic recommendation of the earlier *Hadow Report* in seeing to it that studies bear a relation to the occupations of the districts in which the schools are situated; at most, as in the London Central Schools, they have merely a commercial or technical bias. Grammar schools, in turn, are enjoined by the *Spens Report* to bring their studies "into closer contact than at present with the practical affairs of life,"³ and to make more use of the 'utility' phase in the development of their pupils' interests.⁴ Country grammar schools, in particular, are urged to treat school subjects in a way that will result in "increasing the practical wisdom of the worker on the land, and in preparing pupils for other careers which have a background of agricultural interests."⁵ Thus the

¹ Davenport, quoted by Adams: *Evolution of Educational Theory*, p. 245.

² P. 366

³ P. 162.

⁴ P. 163.

⁵ P. 191.

schools which have regarded academic culture as their special preserve are told to sound a more realistic note.

The *Spens Report*, however, goes further than merely recommending a return to realism in the curriculum of the grammar school. It recommends that "a new type of higher school of technical character quite distinct from the traditional academic grammar school"¹ should be established, and that, "as a first step to this end . . . a number of existing junior technical schools orientated towards the engineering and building industries and any other technical schools which may develop training of such a character as (a) to provide a good intellectual discipline altogether apart from its technical value, and (b) to have a technical value in relation not to one particular occupation but to a group of occupations, should be converted into Technical High Schools, in the sense that they should be accorded in every respect equality of status with schools of the grammar-school type."² The intellectual discipline referred to "includes and depends on the apprehension and application of a variety of related principles";³ and the type of education offered will be one that "will best develop the abilities of pupils with certain interests and with the necessary aptitudes, and will be, in consequence, the best education for them,"³ even if they do not eventually enter the industries in question. Their curriculum for pupils between the age of 11+ and 13+ will be "broadly of the same character as the curriculum in other types of secondary school of equal status";⁴ but for pupils above the age of 13 it will be "designed so as to provide a liberal education with science and its applications as the core and inspiration."⁴

¹ *Spens Report*, p. 371. ² Pp. 371, 372. ³ P. xxviii. ⁴ P. 372.

Such a scheme seems to provide a better safeguard of culture in education than that of an American writer, David Snedden,¹ who, with a great contempt for the teaching of principles which merely go into cold storage, asserted that vocational education must be real in every sense of the word; that actual material must always be handled, and that conditions of work as regards hours and even payment must be similar to those which obtain in real life. He considered that the cost of such training ought to be borne by industry itself, and wished vocational schools always to be in the district where the vocation was practised. General education was to be given in the early stages, and, when the stage of specialized training was reached, cultural education for leisure was to be given in the evenings. The *Spens Report*, less drastic in its insistence on real conditions, considers that "the special value of junior technical schools depends . . . on their contact with the staff and the equipment of a technical college,"² and wishes the new technical high schools to employ the teaching staff and use the equipment of such a college. It used to be debated in educational circles whether, in technical schools, it was better to have a staff of skilled craftsmen with a bent for teaching or one of trained teachers with a bent for craftsmanship. The *Spens Report* inclines to the former alternative and, even in the 'engineering sides' of grammar schools, advocates the employment of teachers "who have had a training in engineering which has included actual practical experience."³ There will clearly be a place for both types of teacher in the new technical high schools.

As regards university education, there is nowadays little argument over the desirability of including

¹ *Vocational Education.*

² P. xxi.

³ P. xxx.

vocational studies in the curriculum. Use and wont decree that there is a place for Chairs of Medicine, Engineering, Education, and even of Brewing. The university is a place of preparation for many vocations, and students in residence have opportunities of contact with others, outside their own faculties, who are to follow callings other than their own. There is general agreement that, notwithstanding the cult of efficiency, there should be as little segregation as possible of students preparing for different vocations. The wisdom of the practice of segregating, at a very early stage, young people destined for the teaching profession is now questioned; courses of training involving the taking of a university degree provide an alternative to the old system which, after a strenuous pupil-teachership that had the merit of eliminating the unfit, gave an intensive *ad hoc* training at a training college. We have heard training colleges for teachers roundly condemned as seminaries which turn out narrow-minded young people who know nothing of the world they are supposed to educate. Although such a view can be easily overstated by those who know nothing of such colleges, there is doubtless much to be said in favour of the future teacher getting a broader vision through the contacts and social intercourse that university life provides. The problem for many of the older training colleges is to secure this breadth of view for their students without sacrificing their own valuable individuality and honourable tradition.

We cannot leave the topic of vocational education without giving brief consideration to the question of the choice of a vocation. The ideal is to avoid the attempt to fit square pegs into round holes; a well-chosen vocation spells not only efficiency but happiness. No one

doubts that medical men and teachers, for example, should have the gifts, inclinations, and attitudes that are the basis of success in their work; but it is equally true, if less obvious, that life for a machine tender is more congenial if his job is one for which he is naturally fitted.

Natural inclinations and interests must always be an important factor in the choice of a vocation. What is the origin of such inclinations and interests? Frequently the young person, copying the enthusiasms and sentiments of an admired personality in his circle of acquaintances, conceives the desire to follow his calling. But Dr Ernest Jones delves more deeply to find the genesis of our desire to pursue a particular line in life. He declares that, in the course of his work as a psychoanalyst, he found that the impulses that led various persons to enter upon their respective callings were "dictated by unrealized and buried tendencies to a far greater extent, in comparison with external inducements and opportunities, than is generally supposed. These external factors, important as they may seem to the casual observer, are often but the pretext for the expression of some primary, submerged striving."¹ We are asked, then, to accept the notion that in our choice we are unconsciously finding an outlet for some repressed craving which dates, possibly, from our infant days. But, while we have become accustomed to the psychoanalytic teaching that many of our most exalted motives may have a lowly origin, we do not altogether surrender the common-sense view that frequently the choice of a career is determined by hero-worship. Whatever their explanation, these inclinations and interests must clearly be taken into account in any effort we may make to give vocational guidance to others.

¹ *Papers on Psycho-analysis*, p. 612.

Not only the interests and inclinations, but also the degree of intelligence and the special aptitudes of a young person must be known. It is fortunately true that inclinations and aptitudes tend to point in the same direction. Careful observation of children may sometimes reveal special aptitudes at an early stage. A boy known to the writer, who, at the age of ten, drew up an elaborate legal code for the gang of which he was the acknowledged Moses, developed at a later stage into an able and enthusiastic student of laws at a university. If such special aptitudes fail to reveal themselves to ordinary observation they may be discovered by psychological tests. Professor Spearman has convinced us of the existence of special abilities such as manual and motor dexterity, ability in calculation, power of memorizing, power of retentivity, linguistic ability, musical ability, and mathematical ability; and he has provided the technique by means of which the degree to which an individual possesses these abilities can be estimated. Münsterberg of Harvard even designed an elaborate apparatus for discovering whether a given individual possessed the combination of abilities necessary for success in so specific an art as that of tram-driving; and although his test seems artificial and remote from the real thing, it seems to have yielded sound results.¹ In London the National Institute of Industrial Psychology undertakes to give vocational guidance on the basis of tests of intelligence and special abilities, supplemented by interviews and reports from parents and schoolmasters; its technique has frequently solved the problem of what to do with our boys and guarded against the unhappiness and ineffectiveness consequent on their following ill-chosen vocations.

¹ See Nunn : *Education : its Data and First Principles*, pp. 134, 135.

Perhaps it would be ideal to have expert psychological advice available in all cases, for teachers cannot apply tests effectively, and their opinions and judgments, as well as those of parents, need supplementing and correcting. Much can be achieved, however, by the pooling of judgments, and the advice of headmasters and careers masters is being sought more and more by anxious parents. A headmaster may collect evidence from his colleagues to help him to give sound advice in the case of a particular boy, and he can form his own general impression; but in this part of his work he may well find it worth while to adopt a systematic recording of school histories and noting of special aptitudes. He may be sure that in adding this to his already heavy burden he is performing not the least of his services to society.

REFERENCES FOR FURTHER READING

- ADAMS: *Evolution of Educational Theory*, Chapters VI and VIII;
Modern Developments in Educational Practice, Chapter II.
- ADAMSON: *The Individual and the Environment*, Book II,
 Chapter V.
- BOARD OF EDUCATION: *Hadow Report*, Chapter V; *Spens Report*, Chapters VIII and XI.
- T. H. HUXLEY: *Collected Essays*, Vol. III.
- JONES: *Papers on Psycho-analysis*, Chapter XXXV.
- MONROE: *Text-Book in the History of Education*, Chapters VIII and XII.
- NUNN: *Education: its Data and First Principles*, Chapter XV.
- SNEDDEN: *Vocational Education*.
- F. H. SPENCER: *Education for the People*.
- H. SPENCER: *What Knowledge is of Most Worth?*
- WATTS: *Education for Self-Realization and Social Service*, Part III, Chapter IX.
- WHEELER: *Creative Education and the Future*, Chapter XVII.

CHAPTER XI

RELIGION IN EDUCATION

IN a time of total war, when everything we value is in danger of being engulfed in a tide of barbarism, there is no need to argue that the education of reconstruction must be based on a sound philosophy. If we are to counter the pernicious doctrines and practices of the states with which we are at war, if we are to insure the world against a recurrence of our present ills, we must seek to build on firm foundations. We are bound to admit that such states do have a definite and firmly held philosophy underlying their political institutions and educational practice. It might, perhaps, be argued that the somewhat nebulous philosophical foundations of our British education are better than the clear-cut doctrines of ruthlessness and power that sustain the educational systems of some totalitarian countries; but few would deny that the time is ripe for our educational authorities and practitioners to cease shelving fundamental questions by means of formulae so vague that they command general assent, and to get down to bed-rock in the matter of principle and aim.

Neither naturalism nor pragmatism is capable of providing the insurance policy that will secure the future not only of our own country and empire but of the whole world. Pragmatism, however, would, by its own principles, indicate the need for a philosophy that would produce more satisfactory results than the philosophy, or lack of it, that has informed our recent system

of education. What has that philosophy been? With a belief in man's inherent goodness that now seems rather pathetic, we have subscribed to a sentimental humanism, a vague liberalism. But, with the results of human wickedness confronting us, we know that this will no longer suffice. A mere humanism is bankrupt; lacking resources beyond itself, it has not stood in the evil day. Most of us now realize that something more virile than a benevolent humanism must be matched against an unscrupulous paganism, if the latter is not to triumph. Humanism must be securely founded on something which supports and sustains it; it cannot of itself endure. If it is not built on a rock, it is powerless to produce permanently satisfactory results, and therefore, on pragmatic grounds, it stands condemned.

It has become abundantly evident that the neglect of moral considerations and the following of an easy-going, short-term expediency bring disaster in their train to nations, whatever may be the case with individuals. The only philosophy that can be expedient in the long run must accord with "the natural laws of the spiritual world." These laws can no more be defied with impunity than the law of gravity. If this is a moral universe, then the only modes of living that have a chance of working well are those which conform to moral laws; anything else, in the nature of things, is bound to fail.

The general argument of this book has been that the worthiest aims and movements in education are those which derive not from naturalism or pragmatism but from an idealistic philosophy of values. Truth, beauty, and goodness are considered to be absolutes, inherent in the constitution of the spiritual universe; and man can fulfil himself only by seeking and finding these

absolutes. They are objects of supreme worth which exist in their own right, and they demand our reverence and claim our allegiance. Education, therefore, must above all else set the feet of youth on the road to the things that are true, honest, just, pure, lovely, and of good report.

How do we find the path to these absolutes? How can we indicate it to those whom it is our duty as educators to guide? No doubt there are strong spirits who can conceive of and follow them as abstract qualities of the Absolute. But the ordinary man sees no beckoning finger in abstractions. How can we supply to him not only a clear vision of the goal but also a dynamic to impel him towards it? How in the nation's schools are we to dispatch our pupils on their spiritual pilgrimage? Clear answers to such questions must be forthcoming if our philosophy of values is to be realized.

It is interesting and instructive to recall a valiant attempt that was made after the last war by Dr F. H. Hayward. In his 'celebrations,' both inside and outside the school, he drew up and conducted ritualistic services, taking some outstanding human personality, such as Shakespeare, Milton, or Newton, or some abstract quality, such as justice, as an object of reverence. Like religious services, the celebrations enlisted the aid of elocution, music, and art. Their aim was to exalt feeling and to supply the emotional drive towards worthy effort. They were often impressive, and were not without value even if their effects were transient. But many interested and sympathetic listeners considered that something essential was lacking in this attempt to find a modern substitute for religion. Only religion itself can give a clear vision of the ultimate goal and provide sufficient incentive to strive towards it; nothing

else can bring a philosophy of values down from the clouds of abstraction. Man has found no way towards the Absolute other than the worship of a Being who is not only absolutely good, but also "full of grace and truth."

To-day it is the conviction of an increasing number of thoughtful people that education, if it is to produce and maintain a high degree of civilization and to safeguard against periodical lapses into barbarism, must be based on religion. Let us be clear what we mean by religion. We mean something much more vital than a vague theism or a code of ethics, however lofty; and, with no disrespect towards Judaism, or Buddhism, or Mohammedanism, or any other exalted religion which directs and inspires the lives of many of our fellow-members of the British Commonwealth, we must emphasize that, for the vast majority of citizens of the mother-country itself, religion means the Christian religion. For it is this religion that has built up the civilization of Western Europe which the new paganism is seeking to overthrow. We have thought in our folly that we could maintain the ethical standards of Christianity although we allowed Christianity itself to lapse; now we know better. We realize that we have been living on the spiritual capital that has been stored up for us, and that we must replenish our capital, generation by generation, if we are not to become bankrupt. The Christian religion, then, must return to its traditional place in the schools as well as in the wider life of the nation.

Few would deny that the present position of religion in our schools, taken as a whole, is profoundly unsatisfactory. What forces have dethroned it from its former high position in education? The emphasis on intellect

rather than on feeling and will, characteristic of the nineteenth century, produced a wave of secularism which had profound effects on the first decades of popular education. The divisions, sometimes bitter, between the different branches of the Christian Church did little to help matters. Their result was the injunction of the Cowper-Temple clause in the Education Act of 1870 that "no religious catechism or religious formulary distinctive of any particular denomination shall be taught in schools which receive rate aid." Although this famous clause sanctioned something more than "Bible reading without note or comment," its negative character has too often tended to deprive religious instruction of its vital content, and to reduce it to mere Bible lessons which are powerless in themselves to engender a religious attitude towards life. In recent years, however, representatives of different Christian denominations in certain areas, alive to the danger of allowing their differences to hinder religious instruction in provided schools, have produced agreed syllabuses of Scripture teaching, and secured their acceptance by the Local Education Authorities and the teachers. Such syllabuses constitute a most important contribution to the solution of the problem of religious instruction in rate-aided schools.

A further step forward was taken in 1939 when the Consultative Committee on Secondary Education, stating its belief that "there is a wide and genuine recognition of the value and importance of religious instruction and the teaching of Scripture in schools, and that the time is favourable for a fresh consideration of the place that they should occupy in the education of boys and girls of secondary school age,"¹ and pro-

¹ *Spens Report*, p. 206.

claiming its conviction that "no boy or girl can be counted as properly educated unless he or she has been made aware of the fact of the existence of a religious interpretation of life,"¹ provided a charter for the serious study of Scripture in the secondary school. To-day, when we are anticipating the provision of some form of secondary education for all pupils, this should come to mean that no one will leave school without having had at least the opportunity of receiving systematic religious instruction.

In February, 1940, the growing concern over the unsatisfactory character of religious instruction in most of our schools was voiced in a leader in *The Times*. Under conditions of evacuation the grim fact had become evident that "in a country professedly Christian and a country which at the moment is staking its all in defence of Christian principles, there is a system of national education which allows the citizens of the future to have a purely heathen upbringing." The writer, maintaining that "religion must form the very basis of any education worth the name, and that education with religion omitted is not really education at all," that "the basis of good citizenship is character, and a man's character depends on his beliefs," asked how it is that the State "can afford to ignore these simple truths, and to view the teaching of religion as a task with which it has no concern." "For many years," he said,

we have been living on spiritual capital, on traditions inherited from the past, instead of providing for the future. Christianity cannot be imbibed from the air. It is not a philosophy but a historic religion, which must dwindle unless the facts upon which it is founded are taught, and such teaching made the centre of our educational

¹ *Spens Report*, p. 208.

system. . . . The highest of all knowledge must be given frankly the highest of all places in the training of young citizens. It will be of little use to fight, as we are fighting to-day, for the preservation of Christian principles if Christianity itself is to have no future, or at immense cost to safeguard religion against attack from without if we allow it to be starved by neglect from within.

Concrete and authoritative proposals have now come from Lambeth Palace. The Archbishops of Canterbury and York, after consultation with the Diocesan Bishops of the Church of England and the Church in Wales, and in full agreement with leaders of the Free Churches, have urged the following five points:

(1) In all schools a Christian education should be given to all the scholars (except in so far as any parents may wish to withdraw their children from it). The religious instruction should be entrusted to teachers willing and competent to give it. We desire that no teacher should be prejudiced in his professional career by his unwillingness to give this teaching: but all teachers will agree that it is a sound principle of their profession that the teaching of any subject should be in the hands of persons qualified by personal interest, by knowledge, and by training to give it.

(2) We urge that religious knowledge and the imparting of it should be an "optional subject," not merely an "additional option," in the course of training for the Teacher's Certificate. This means that it should count in the gaining of the certificate.

(3) Where only one or few teachers in the school are duly qualified to give Christian teaching we urge that it should be made permissible to give this teaching at any period within school hours, so that the same teacher may teach several classes at different periods.

(4) In order that the importance of the religious

teaching may be recognized we urge that it should be inspected in respect of its methods by H.M. Inspectors, or by some other duly authorized person.

(5) We urge that in all schools the time-table should be so arranged as to provide for an act of worship on the part of the whole school at the beginning of the school day.

In these proposals the Archbishops, while welcoming the recommendations of the *Spens Report* for secondary schools, concern themselves specially with elementary schools. They regard the development of the agreed syllabus as one of the most hopeful signs of the times; and they believe that, if the steps which they advocate are taken, "grave hindrances to real Christian education will be removed and great progress will be achieved."

With the authority of the Archbishops behind us, joined to that of a Consultative Committee of the Board of Education and reinforced by the prestige of *The Times*, we may proceed to examine a little more closely the place of religion in the school and the means that are available to us for promoting Christian education.

"Religion," said Eucken,¹ "does not mean a special domain by the side of others—its intention is rather to be the innermost soul and the supreme power to the whole life." Applied to the school this means that religion must be something much more than a subject on the time-table, although time must be allocated for its special study; it must be an activity and a spirit pervading the whole of the life and work. We must attempt more than the instruction of pupils in the doctrine and ethic of Christianity. We must not merely provide an objective study of the Christian foundations of our civilization, but do something that is calculated

¹ *Life's Basis and Life's Ideal*, p. 7.

to make Christians. In general, we must seek to create conditions favourable for pupils spontaneously giving their allegiance to Christ, and formulating and confirming their faith. Our schools, as Dr J. W. Skinner has said, borrowing a phrase from John Wesley, must be "nurseries of Christians." In the minds of our pupils we must sow the seed that will produce "lovers and servers of God, lovers and servers of men";¹ and we must continue our efforts whether or not we can see immediate results.

What means are open to us if we are seeking to establish religion as the background of the life of the school? First of all, we may note assemblies for worship at the beginning and end of the day. Such assemblies, unfortunately for our purpose, can only too easily be used as occasions for pronouncements of an entirely secular character. It would be going beyond the bounds of practical politics to say that nothing of a non-religious nature should ever be introduced, even after the completion of the act of worship; but it will be agreed by most that the effect of the worship may easily be nullified by an unwise and untimely reading of the Riot Act to the school. School worship, says Skinner, "must have certain characteristics if it is to be effective. It must be sincere; it must be simple; it must be short."² If these conditions obtain, if the service is sufficiently dignified to be worthy of its high purpose, much may be achieved. Feeling will be directed and exalted, and the day's work will begin or end in the right spirit. The singing of suitable hymns is a highly important aspect of school worship. It is a great mistake to suppose that the hymns should all come in the category "suitable for

¹ J. W. Skinner: *Nurseries of Christians*, p. 16.

² *Ibid.*, p. 20.

children," for there can be nothing more insulting to the intelligence of a young adolescent, or more calculated to bring the whole act of worship into contempt in his mind, than the imposition of a succession of puerile, silly hymns. The great hymns of the faith, both those that have come down to us from the early Fathers of the Church and those of the hymn-writers of more modern times, should be used. Daily assemblies also provide an opportunity for a systematic reading of the Bible which can be organically related to the general scheme of Scripture teaching that is followed in the school. Prayers may be extempore if the headmaster or other leader of the worship has a gift in this direction; otherwise it is advisable to use the well-tried prayers of the Church's liturgy.¹ Finally, there is much to be said for the practice of giving an active part in the service to the senior pupils, encouraging them to prepare and read portions of Scripture, and even to read prayers.

In the second place, we may note the corporate life of the school as an important means of fostering the growth of Christians. In the relationships between master and pupil, and between pupil and pupil, we have golden opportunities for practising the Christian ethic. There are further opportunities on the sports field; indeed, 'playing the game' is essentially a Christian virtue. It is easier to get an ideal school than an ideal state; and the creation of a real Christian brotherhood in a school is not beyond the bounds of possibility. Such a school will be a light on a hill that cannot be hid, and no limit can be set to its influence in the larger community. In approaching such an ideal, boarding-schools have a clear advantage over day-

¹ Or those in a collection such as *A Book of Prayers for Schools*.

schools, for they absorb the whole life of their pupils during term-time.

Thirdly, we have the teaching of Scripture and Christian doctrine. We must realize clearly that it is insufficient to treat the Bible as great literature, although indeed it is "one of the glories of the literary heritage bequeathed to the English-speaking peoples."¹ Nor will it suffice to treat it as history, although, along with the literature of ancient Greece and Rome, it is the very foundation of our civilization. We are concerned to teach the Bible mainly because it is "the classic book of Christianity and forms the basis of the structure of Christian faith and worship."² Christianity is a historical religion, and the Bible constitutes the record of the events and movements that brought it into being. The Old Testament as well as the New must be studied, for the latter can be properly understood only in the light of the former. In the Old Testament we have the evolution of ideas about God which, in the fulness of time, made possible the idea of His universal Fatherhood proclaimed by Jesus. And although it must always be insisted that religion is not merely a matter of intellectual conviction but something which disciplines the feelings and the will, it is wrong to suppose that the intellectual element is unimportant. Christianity does have an intellectual content, and that is based on the Bible. For all these reasons Scripture teaching is essential for Christian education.

Little of permanent value can be achieved by the method of taking isolated portions and squeezing a moral out of each. "If religious instruction of any kind is to have a place in the curriculum it should be as well taught and effectively planned as any other branch of

¹ *Spens Report*, p. 208.

² *Ibid.*

study.”¹ It should rank equally with other studies even to the extent of being an examination subject, and it should be subject to inspection. It cannot be adequately treated except by a teacher who himself has clear ideas of the different aspects of Biblical study, such as the growth of ideas about God, the development of moral standards towards the Christian ethic, the life and teaching of Jesus, the foundation of the Christian Church, and the bases of Christian theology. He ought to have a knowledge of ancient history that will enable him to appreciate the background against which the Bible was written, and he cannot afford to be ignorant of the agreed conclusions of modern scholarship. He must observe the stages of mental development in his pupils, and proceed step by step to the highest of which they are capable. In a word, he should be not merely an enthusiast for Biblical study, but also a trained expert as regards its content and the methods suitable for its presentation. In post-primary schools of all types the needs of adolescence call for a properly qualified specialist with a degree or diploma in Divinity, one who is able to deal effectively with the questions and difficulties of intelligent pupils. But in primary schools also the teaching should be the best possible, and be entrusted to those who have included Scripture or Divinity in their certificate. Some sixth-form masters, having themselves a philosophical bent, may think it even worth while to discuss with their forms the divergent interpretations of life supplied by different philosophies and to present Christian theology in its philosophical setting. Some headmasters have found it possible to stimulate much interest among senior boys by a course of this character.

¹ *Spens Report*, p. 207.

Difficulties must not be overlooked. One that is very obvious arises from the size of the Bible. It is, of course, a library rather than a single book, and a certain degree of selection is necessary. Another difficulty arises from children leaving school at the age of fourteen, or even fifteen. It may well be asked how much can be achieved with them. Perhaps the most the teacher can hope to do is to create an interest and to lay foundations on which something may be built later. But if and when the slogan "Secondary education for all" at last becomes a reality, this difficulty ought to disappear; and there ought to be further opportunities in connexion with the Youth Movement, now so happily making rapid progress. The Gospels, too, which should be the core of the teaching, present special difficulties of their own. It would be idle to make light of such difficulties; yet the *Spens Report* stoutly maintains that "the Biblical literature contains a body of perfectly intelligible ideas which can be systematically presented and studied."¹ It advises an objective and historical approach; pupils must learn what the books meant to those who wrote them and to those for whom they were written. "Scripture taught with this purpose in view is the best foundation for any other religious education given in the school concurrently or subsequently."²

Our fourth and not least important means of engendering a religious attitude towards life is the teacher's personal influence. "It can hardly be disputed," says the *Spens Report*, "that the best teacher is one whose interest in the subject and desire to teach it proceed from religious faith."² We would go further, and say that he is bound to fail in the main objective if he does not have such an attitude, for the child's attitudes are

¹ *Spens Report*, p. 208.

² *Ibid.*, p. 209.

shaped in the main "by sympathetic contagion and by suggestion from admired personalities."¹ Even if he does have it, the effects of his work are liable to be nullified by the lack of it in certain of his colleagues. Skinner discusses this problem, painting a hypothetical picture of the harm that may be done by a master's common-room which contains "the genial and gentle agnostic, the outspoken atheist, and the pungent anticleric,"² none of whom takes care to conceal his opinions from his pupils. It is not suggested that such have no right to undertake the work of education in our democracy, or that that *bête noire* of the National Union of Teachers, a religious test, should be imposed. The problem, however, is a real one, and the issue must be faced some time and somehow. No doubt it will at least be agreed that, in the interests of fairness, unbelieving and agnostic teachers must not, wittingly or unwittingly, hamper the efforts of their colleagues. But one wants more than benevolent neutrality in the matter. Christianity cannot become the basis of the life and work of our schools of reconstruction unless we succeed in attracting to the teaching profession large numbers of young men and women who are themselves believing and practising Christians.

Since this book is sent forth from a residential training college connected with an important branch of the Christian Church, it may perhaps fittingly conclude with a few remarks on the function of colleges of this type. Their position with regard to the matter under discussion is both interesting and important. Originally founded to train teachers for denominational schools, they have more and more been supplying teachers to the provided

¹ McDougall: *An Outline of Psychology*, p. 436.

² *Nurseries of Christians*, p. 8.

schools. The question whether or not they have ceased to fulfil their function, whether or not their continuance is justified, has often been raised. Are they mere anachronisms whose survival in a more enlightened age is dictated solely by reasons of sentiment? They have been accused of being seminaries in which young people are closely segregated and kept from contacts with the society they will be called upon to serve; they have been stigmatized as hotbeds of sectarianism. Stones have again and again been thrown at them by those who are ignorant of their purpose. What is the true position? What is their real justification to-day?

We may say, to begin with, that they collect and train for the teaching profession large numbers of young men and women who have been brought up in homes where Christianity is believed in and practised. A college that is maintained and inspired by a religious body, if it is wisely administered, if the authorities can succeed in rising to their tremendous responsibilities, is in a position to confirm, sustain, and inform the faith of such young people at a critical stage of their development. Its ideal is to provide a Christian brotherhood or sisterhood which will be a source of strength and inspiration to all its members.

In such an institution the college chapel can be made the centre of the whole life. The effects of its services, if they are simple and dignified, with worthy singing of great hymns, with preaching that is sound and informed by a broad-minded sincerity, are as important as they are far-reaching in their ultimate effects on the education of the whole country. The services should be designed to meet the needs not only of the members who belong to the church of which the college is an organ, but also of those members who belong to other churches and to no

church. From the matrix of a good chapel there is a spontaneous growth of Christian activity and fellowship in the college. Someone will raise the bogey of compulsory chapel. The writer can only reply that at Westminster College it has been found sufficient to explain to students that chapel is, and is intended to be, the centre of college life. Such an explanation, reinforced by a long tradition, results in loyal attendance and support without any recourse to roll-calls. Most students, in all probability, are glad to be told definitely what is expected of them in this matter.

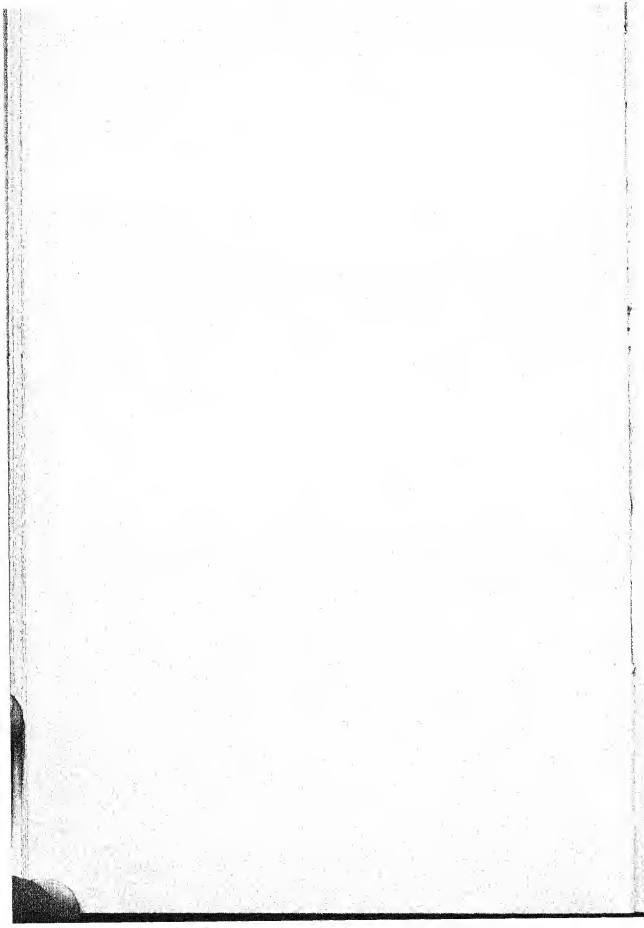
Residential colleges with a religious foundation have thus a magnificent opportunity of being nurseries of Christian teachers. They do not have to import Christianity from without; rather is Christianity the very essence of their being. An important aspect of their work must always be the study of the Bible and Christian doctrine. They must have experts who are qualified not only to lead and inspire the chapel services, but also to teach Scripture in the light of modern scholarship, to treat Christian doctrine in broad-minded, scholarly fashion, to convince students that such studies are worth their best intellectual effort, and to prepare students to tackle the work in schools of various types.

If these things are accomplished with even a proportion of the students an *apologia* for the continued existence of such voluntary colleges is no longer needed. It is they, primarily, who must give effect to the provisions of the *Spens Report* and the Archbishops' appeal, and to the injunctions of *The Times*, by providing the teachers required by the schools. They have now to fulfil a function wider and more important than that for which they were founded. Their purpose is nothing

less than the turning out from their walls of a steady supply of men and women who will be the leaven that will leaven the whole lump of national education, not by disseminating distinctive and exclusive dogmas, but by being themselves broad-minded, large-hearted, sincere, and informed Christians who are eager and well equipped to contribute to the reconstruction of the foundations of our Christian civilization.

REFERENCES FOR FURTHER READING

- BOARD OF EDUCATION: *Spens Report*, Chapter V.
BRYANT: *Moral and Religious Education*.
CAMPAGNAC: *Converging Paths ; Religion and Religious Training*.
FARLEY: *The Faith*.
HARRISON: *Christian Leadership in School and College*.
HEAWOOD: *Religion in School*.
HUGHES, D.: *The Menace of Paganism in The Assistant Master Speaks*.
HUGHES, H. M.: *Christian Foundations*.
HUGHES, M. V.: *Scripture Teaching To-day*.
HUMPHREY: *The Christian and Education*.
KENNETT: *The Teaching of Scripture*.
MARTIN: *A Book of Prayers for Schools*.
RAYMONT: *The Use of the Bible in the Education of the Young*.
RYDER SMITH: *What is the Old Testament?*
SKINNER, C.: *A Boy's Right to Religion*.
SKINNER, J. W.: *Nurseries of Christians*.
TOYNE: *Theology in the School*.
WODEHOUSE: *The Scripture Lesson in Elementary Schools*.
YEAXLEE: *The Approach to Religious Education ; Religion and the Growing Mind ; Handbook to the Cambridgeshire Syllabus of Religious Teaching*.
The Cambridgeshire Syllabus of Religious Teaching for Schools.



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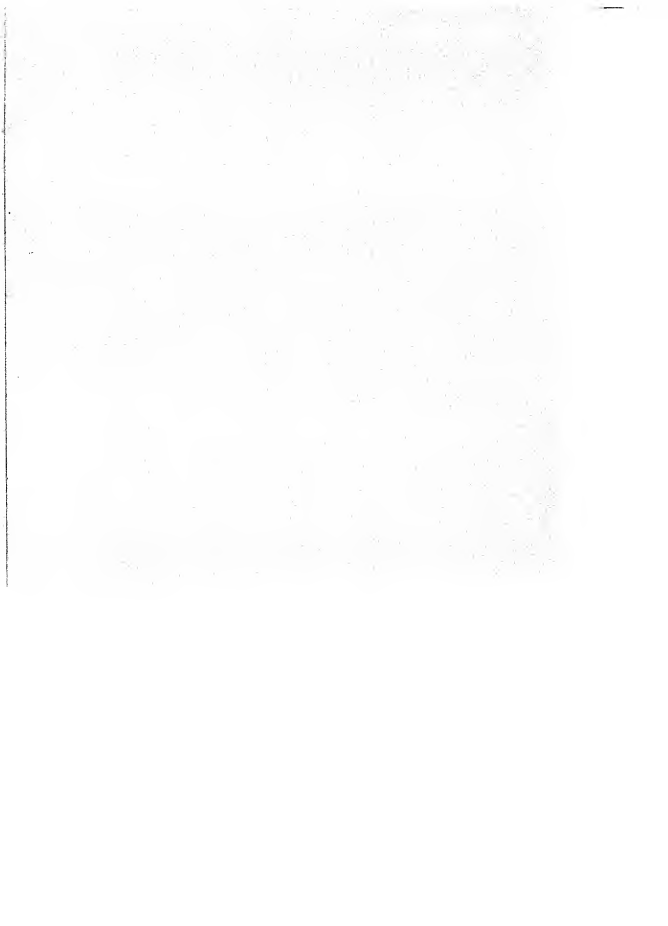
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